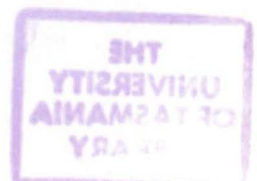


**The Social Bases of Environmentalism in Australia**

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Bruce Tranter.

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## **Abstract**

The nature of support for environmentalism - conceptualised here as attitudes and behaviour supportive of ecological prudence and the green movement - has grown to become a major issue of contention among contemporary social scientists. Some researchers suggest that support for environmentalism stems from a 'new' or 'new middle' class, post World War II generation and, in particular, from among highly educated and left leaning urban dwellers. Others maintain that social location has diminishing utility for explaining social phenomena, and claim instead that new value orientations are the key to understanding support for environmental movements and concerns.

This research aims at reviewing and evaluating these claims. Part I reviews the theoretical arguments underlying the diverse class, generation and social status accounts of environmentalism. Critical evaluation of these accounts forms a springboard for empirical analysis. Part II examines empirically the social bases of environmentalism in Australia using nationally representative survey data. The impact of (new) class, status group, generation/cohort, and other aspects of social location, as well as 'postmaterial' values on environmental concerns and activism is assessed using multivariate techniques. Particular attention is paid to the hypothesis that support for environmentalism in Australia comes from certain status categories of people sharing similar lifestyles.

In general, there is a weak relationship between social location and environmental commitment and activism, although the relative explanatory value of social location varies according to the aspect of environmentalism under consideration. Age, new class location, postmaterialist value orientations and political partisanship are the best predictors of environmental concerns and activism, while lifestyle also has an impact upon environmental group support.

While 'social base' effects are discernible, they have limited utility for explaining environmental new politics. Like other aspects of the new politics, environmental concerns and activism in Australia are detached from the 'old' social



bases of class, generation and status. Green supporters and sympathisers in Australia do not form clearly circumscribed social groupings, and they do not seem to be motivated by the traditional group interests that propelled 'old' politics. The social constituencies of environmentalism appear to be vague and fluid thus posing a major challenge to the established sociological approaches to environmentalism.

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## **Chapter 1**

### **Environmentalism, New Politics and Social Base**

In Australia, as in all advanced societies, the environment has become a major social and political issue. Its growth as a public concern and a source of social mobilisation is well documented, as is the rise of green parties over the last decade (Bean et al 1990, McAllister 1992, 1994, Papadakis 1993, 1994, Crook and Pakulski 1995, McAllister and Studlar 1995). While green voting and green party formation have been extensively studied in Australia and elsewhere,<sup>1</sup> increasing public concerns about the environment and green movement activism are not as well understood. Attempts have been made to link the spread of environmental concerns with the rise of new classes, the formation of new status groups (especially radical intellectuals), the ascendancy of postwar generations, as well as postmaterialist value shift, and media exposure of environmental hazards (for example, Eckersley 1989, Papadakis 1993, Crook and Pakulski 1995). However, systematically conducted, empirically based sociological studies of environmentalism remain rare. This study aims to bridge this gap by critically examining the major 'social location' accounts of environmentalism, and by systematically testing their relative empirical 'fit'. The empirical section focuses on the Australian case, and utilises a variety of survey data from the 1990's. The key issue is the extent to which environmental concerns and activism in Australia are socially located in classes, status groups and generations.

One of the most puzzling aspects of environmental social movements and public concerns is their 'floating' nature. The social composition of green movement supporters seems to defy the established wisdom of political sociology, which depicts political activism and associated ideological orientations and interests as located in specific social classes, strata, status categories, age groups or generations. Yet in

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<sup>1</sup> This research does not examine environmental voting behaviour as there have been extensive studies of new politics parties in Australia (see Bean et al 1990, Marks and Bean 1992, McAllister and Studlar 1993, McAllister and Vowles 1994, Bean and Papadakis 1995, McAllister and Studlar 1995).

spite of the wide recognition of this seemingly 'floating nature', the most popular accounts of environmentalism continue to link it with one or more of the established 'social location' categories: new or middle classes, professional strata, urban intelligentsia, baby boomers, generation X and so on.

The disparity between empirical studies that point to the 'floating' nature of environmental activism and concerns, and social theorising that attempts to ground environmentalism in a variety of social grids, has a demoralising and paralysing impact on environmental studies. It seems to perpetuate a divide between empirical studies, that use descriptive categories on the one hand, and largely abstract theorising that follows the classic social base models on the other.

As the reference in the title to the 'social base' implies, this thesis focuses upon explanations of environmental concerns and activism that follow the 'classic' sociopolitical model, according to which political preferences and behaviour in Western societies principally reflect social-structural location and its historically evolving patterns (see Lipset and Rokkan 1967, Lipset [1960] 1981). However, it is now widely accepted that the utility of social-structural explanations, class explanations in particular, are in decline (for example, see Clark and Lipset 1991, Franklin et al 1992). This decline, it is argued, is most pronounced in new forms of political activism, such as those associated with environmentalism (for example, see Crook et al 1992). Other aspects of social location have been investigated as alternatives to class, and the attention of political sociologists has shifted to political institutions and political culture. Yet while there is an extensive body of literature identifying and analysing non-class aspects of conventional politics, the association between these and *new politics* has not been examined in an equally systematic way. This is particularly so in Australia, where the relationship between support for environmentalism and occupational strata, status blocs and generational segments awaits rigorous examination.

The thesis is divided into two main parts. The first has a theoretical focus; it examines the major class, status and generational accounts of environmentalism. The

analytical clarity, theoretical consistency, and completeness of these accounts of environmental 'new politics' are critically assessed in Chapters 1 to 4 . In Chapter 1, I begin by outlining the rise of environmentalism in Australia, in order to highlight its specificity. The diversity of environmental concerns and activism are then discussed, thereby preparing the grounds for a revision of the literature on environmental new politics and their social bases. In Chapter 2, new class accounts of environmentalism - linking environmental support with class interests - are discussed. Chapter 3 examines generational accounts, such as Inglehart's generational/value change thesis, which suggest that post war generations show greater propensity to support environmental activism. Status based explanations are discussed in Chapter 4, in particular, the claims that environmental concerns and activism are higher among 'intellectual' status categories. A number of other social base explanations are also examined in this chapter, including those that suggest environmental concerns vary between religious, urban/rural, and ethnic categories.

The second part (Chapters 5 to 7), consists of an empirical evaluation of the relative fit of these diverse 'social base' accounts of environmental concerns and activism using Australian survey data. Chapter 5 explains the development of the research models, describes the data, the dependent and independent variables, and analytic techniques. Environmentalism is conceptualised in this research as having both 'attitudinal' and 'behavioural' aspects. Utilising nationally representative survey data, the empirical analyses examine the social location of these two aspects using different multivariate techniques. Chapter 6 examines the 'attitudinal' aspects of green support, while the 'behavioural' aspects are explored in Chapter 7.

### **The rise of environmentalism in Australia**

Concerns over the natural environment in Australia are not as 'new' as some claim, with a number of conservation organisations emerging in the mid to late nineteenth century (Hutton 1987, Papadakis 1993). Wootten (1985:25) maintains that the conservation movement in Australia has two separate sources; in the "scientific and natural history groups" formed in the late nineteenth and early twentieth centuries, and

in the “members of the outdoor recreation movement, principally bushwalkers, who developed their organisations in the first half of this century”. Papadakis (1993:65) argues that groups like the “Field Naturalists’ Section of the Royal Society established precedents for campaigns by conservationists in lobbying governments and government agencies, in attracting widespread popular support and in gathering information on conservation issues”. The Wild Life Preservation Society of Australia, formed early this century, also “campaigns successfully to prevent mining and the exploitation of timber in Australia’s first National Park at Port Hacking”, and fought for “legislation to protect flora and fauna” (1993:66).<sup>2</sup> The modern environmental movement is also predated by groups such as The Mountain Trails Club and the National Parks and Primitive Areas Council, that challenged established beliefs relating to nature (Papadakis 1993:68).

However, a number of authors agree that the growth of the contemporary environmental movement was spurred by the campaign to save Lake Pedder in South West Tasmania from flooding in the early nineteen seventies. Holloway (1991:78) points out that the campaign “laid the organisational and political foundations of the wider movement”, with the Lake Pedder Action Committee “forming the basis of the Wilderness Society”. Wootten (1985:25) claims that the fight to save Lake Pedder was a “landmark in the development of the conservation movement”, arguing that it led to the “growth of the Tasmanian conservation movement and the development of a national consciousness”. The Lake Pedder campaign also spawned the world’s first green party, the United Tasmania Group (UTG) in 1972 (Holloway 1986, Parkin 1989, Larmour 1990).

Although the campaign to save Lake Pedder was lost when the lake was flooded in 1974, the political and organisational skills gained through involvement in the Pedder campaign were successfully employed in subsequent environmental actions (Easthope and Holloway 1989:189). Perhaps the most important of these in terms of mobilising mass public opinion was the Franklin River Campaign of 1982-1983. The

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<sup>2</sup> Naturalist organisations campaigned with some success to protect wildlife in the nineteenth century (Papadakis 1993:65).



Tasmanian Wilderness Society (now The Wilderness Society) formed in 1976 mainly from core members of the UTG, and played a key role in the Franklin Campaign.

It was only in the 1980's that there emerged broad challenges to the institutional order, in the form of social movements like the one opposed to the construction of the Franklin Dam in Tasmania (Papadakis 1993:68).

The Franklin Campaign saw a coordinated effort to involve the mass media. The protest actions of demonstrators at the Franklin blockade were televised nationally, and as Doyle (1995:63) notes they "made great television, and middle Australia was watching".<sup>3</sup> Mass media coverage of this new social movement protest popularised the fight for the Franklin, mobilised mass support, and consequently had an impact upon national politics. As Papadakis (1989:95) notes, "movements make news: news makes the movement's issues public". The environment became a federal election issue championed by the Australian Labor Party, and the proposed dam development was halted upon the election of the new ALP Prime Minister, Mr Hawke in March 1983. A number of other major environmental 'victories' followed throughout the 1980's, including the protection of Kakadu and the Daintree, preventing the construction of the Wesley Vale pulp mill in Tasmania, and stopping the logging of National Estate forests in New South Wales and Victoria.

While political activism on environmental issues fluctuates with 'crises'<sup>4</sup> and campaigns, public concerns about environmentalism shows a somewhat curious, and more steady pattern. The percentage of Australians who believe that 'the environment' is the most important problem for the federal government, rose dramatically from five per cent in 1988, to twenty six per cent in 1989, and after dipping slightly remained stable at a level around twenty per cent into the 1990's (McAllister and Studlar 1993:354-355, Crook and Pakulski 1995:43). Public support

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<sup>3</sup> Coverage of environmental issues and concerns in the print media also promotes environmental causes (Kielbowicz and Scherer 1986). Although newspaper coverage of environmental stories tends to wax and wane according to issue salience, the overall level of coverage has increased over time, and editorial policy now tends to be more sympathetic (Sylow 1994).

<sup>4</sup> By 'crises' I mean particular threats to the environment such as logging of pristine wilderness areas, or the threatened extinction of endangered species caused by flooding land for the construction of large dams.

for environmental groups tends to be lower and more stable, at around three per cent to five per cent.<sup>5</sup> It may rise and fall in response to current 'environmental crises', and according to the emphasis placed upon 'the environment' as a political issue. Although support for 'the environment' as an election issue may have peaked around the time of the 1990 federal election, approval of environmental groups and popular concerns about environmental issues remain at a high level (Papadakis 1993:142, McAllister and Studlar 1993:354-355). Papadakis (1993:11) notes that the "preoccupation with environmental issues represents only one aspect of the agenda of new social movements and of the new politics", and that within the new political arena "the issue of environmental protection has become the predominant theme". Similarly, Dalton (1988:110) suggests that "environmental groups have often spearheaded the New Politics challenge to the traditional political values of industrial societies" and further points out that "a large number of citizens are willing to sacrifice some economic growth and lower prices for an improvement in the quality of the environment".

Environmentalism is seen as the most important and representative aspect of the new political phenomena in Australia. Green movements attract a growing number of supporters and sympathisers, and approval of environment groups and environmental group membership in Australia, is stable at relatively high levels (Papadakis 1993, 1994).<sup>6</sup> The environment is also an important issue internationally, particularly in Western Europe. In a survey of nine European countries conducted in 1990, on average over 90 per cent of respondents support the ecology movement, irrespective of nationality (Ashford and Halman 1994:78).<sup>7</sup> While support for other social

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<sup>5</sup> Group membership stood at 3 per cent in 1990 and 5 per cent in 1993, while those who are not members but have considered joining, comprise 22 per cent of the sample in 1990, and 18 per cent in 1993 (Source: AES).

<sup>6</sup> Australian Electoral Study results show that 74 per cent of respondents in 1990, and 73 per cent in 1993 either strongly approve or approve of environmental groups.

<sup>7</sup> The breakdown of support by countries is as follows: Great Britain 92 per cent, Northern Ireland 89 per cent, Republic of Ireland 94 per cent, West Germany 97 per cent, Netherlands 95 per cent, Belgium 93 per cent, France 91 per cent, Italy 92 per cent, Spain 90 per cent.

movements fluctuates markedly across national borders, the ecology movement is very popular in all Western European countries.<sup>8</sup>

Further, environmentalism seems to be unique in its political ascendancy and articulation. Among contemporary Australian new social movements (for example, anti-nuclear, peace, human rights, aboriginal, gay and lesbian rights, women's), only the environmental movement has succeeded in propelling political representatives to federal and state parliaments,<sup>9</sup> with two Green senators, and four Greens in the Tasmanian Lower House.<sup>10</sup> Although not strictly a 'green' party, the Australian Democrats may also be seen as a 'new politics party', and "one of the major proponents of environmentalism" (Papadakis 1993:5). Thus, there is little doubt that in Australia, 'the environment' remains an important long term political issue, with the public still "prepared to continue supporting policies that implied tax rises and increases in prices in order to address environmental problems" (Papadakis 1994:71).

Green parties and new social movements are also popular in a number of other developed countries. In Western Europe, the (West) German Greens are Europe's most successful green party in terms of electoral support (Frankland 1995:39). The Belgian ecology parties Agelev and ECOLO are also politically successful, as are new politics parties in Austria, Finland, Italy, Sweden and Switzerland (Kitschelt 1989, Kolinsky 1989, Müller-Rommel 1989, 1990, Parkin 1989, Richardson and Rootes 1995).

Critics may argue that the electoral success of the new parties is limited, as their impact on policy formulation is minimal. Nevertheless, minor parties often have disproportionately greater power than the number of parliamentary seats they hold implies. In mixed party systems, small parties often hold the balance of power. In

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<sup>8</sup> Ashford and Halman (1994:78) found that more people were in favour of the ecology movement (93%) than human rights (91%), anti-apartheid (80%), disarmament (78%), nuclear energy (71%), and the women's movement (62%).

<sup>9</sup> The Nuclear Disarmament Party previously held a Senate seat and polled 7.2 per cent of Senate first preferences in 1984 (Papadakis 1993:181)

<sup>10</sup> The former 'Green Independents' were involved in the Green/Labor Accord in 1989. Although the Accord was short lived, the Greens still hold 4 seats in the Tasmanian House of Assembly (Larmour 1990), and after the 1996 Tasmanian elections once again hold the balance of power. The Green party formed on a national level in August 1992 (Papadakis 1993:180).

such cases the potential for these parties to impact upon policy formation significantly increases.<sup>11</sup>

### **What is environmentalism?**

The terms 'environmentalism', 'conservation', 'green', and 'ecological' cover a variety of quite different forms of activism, issue concerns and political preferences. Before the social base question is addressed, it is necessary to discuss these highly contentious concepts. There is some confusion over the meaning of environmentalism, with terms such as 'environmental', 'conservation', 'ecological' and 'green' all interrelated. Like many concepts in the social sciences, such terms are often used interchangeably, while they may have quite different meanings. The term 'environmentalism' denotes a wide variety of issue-concerns, preferences, ideas, attitudes, and forms of activism. Vedung (1991) cited in Jehlicka (1994:113), for example, defines environmentalism as "the movement in favour of a cleaner world, with less pollution, less depletion of natural resources, conservation of wilderness areas and recycling of resources". It also subsumes members of 'Green' political parties and their supporters, and a large section of the public who sympathetic to environmental issues. In a broad sense, environmentalism also encompasses 'environmentally friendly' patterns of consumption and marketing,<sup>12</sup> and is occasionally linked with 'alternative lifestyles' (see Milbrath 1984, Poguntke 1993). Therefore, as Papadakis (1993:46) suggests, "being an environmentalist can mean many different things to different people".

Typically, the term 'environmentalism' encompasses concerns over quite diverse environmental issues. They range from the largely urban-based issues relating to waste disposal and air pollution, to ecological concerns over preservation of pristine wilderness, and agricultural concerns over soil conservation. They may be local (for

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<sup>11</sup> The two Green senators and the Australian Democrats effectively hold the balance of power in the Australian Senate.

<sup>12</sup> Ozone friendly appliances, recycled products, products not tested on animals or which respect the rights of other species such as free-range eggs, 'dolphin safe' fishing methods, and so on.

example pollution of waterways), national and international (for example acid rain), or even have a global impact (for example the 'greenhouse effect').

In an empirical study of the dimensions of environmentalism in Australia, McAllister (1994:22) identifies three dimensions: "a cosmopolitan dimension, encompassing national and international concerns; a local dimension focussing on general concerns; and a local dimension concerned solely with damage to land". He finds greater support for 'cosmopolitan' issues than localised concerns.<sup>13</sup> In a somewhat similar vein, Crook and Pakulski (1995) find two distinct clusters of environmental issue concerns - 'green' and 'brown'. They suggest that the 'green' issue cluster (logging of forests and destruction of wildlife), are most closely associated with the goals of environmental groups and their "young, active, radical and left-leaning" followers (1995:51). On the other hand, the broader 'brown' concerns (about pollution and waste disposal), "have no obvious or natural ideological/discursive home, just as their constituency has no specific cultural, social or political milieu" (1995:54).

Concern over environmental issues is expressed in a variety of ways. These range from public opinion expressed at the polling booth, to joining environmental groups through to participation in environmental activities such as protests, rallies and blockades. Conventional parties are not always willing to accommodate the issues important to environmentalists, and the relatively new green parties are rarely able to exercise any serious political power.<sup>14</sup> The broader environmental movement therefore remains important as a means of mobilising mass public support in order to bring pressure to bear on governments. Lowe and Goyder (1983:9) suggest that

The environmental movement consists of a number of environmental groups, the organisational embodiment of the movement, and what might be termed the attentive public: those people who, though they do not belong to any of the groups, share their values. The attentive public

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<sup>13</sup> Such 'cosmopolitan' issues include depletion of the world's forests, the greenhouse effect, destruction of the ozone layer, extinction of plants and animals, logging of native forests, dumping toxic waste at sea, disposal of industrial waste, pollution of rivers and lakes, and land degradation (McAllister 1994:28).

<sup>14</sup> While they hold the balance of power in some instances, they are rarely able to implement policies.

for the environmental movement would include the readership of various environmental magazines, students of environmental studies in schools, colleges and universities, sympathetic members of the design and land-use professions and the many people who, through their personal convictions, behaviour, and life styles, express their concern for the environment - for example, organic gardeners, health food devotees, outdoor enthusiasts and supporters of recycling schemes.

Although there is little consensus over what is meant by the term 'environment', one obvious distinction may be made between the 'natural', and the 'human' created environment. This divide gives rise to different types of environmental organisations and new social movements. Dobson (1990:3), for example, suggests that concerns over the 'human' and the 'natural' environment are expressed by *conservation* and *environmental* organisations respectively. He maintains that conservation organisations, such as the British National Trust, express concern for the environment "principally through the restoration of and care for old and striking buildings and their grounds" (Dobson 1990:3). At the other end of the spectrum, environmental organisations such as Greenpeace and Friends of the Earth "typically confront the negative effects of the environment of the late-twentieth century society and try to ameliorate them" (1990:3). This reflects not only different types of concerns but also different approaches to goal attainment. Yet even organisations with similar goals sometimes adopt very different strategies to achieve them, ranging from "spectacular forms of direct action, as in the case of Greenpeace" to "expert and patient lobbying, the preferred tactic of Friends of the Earth" (Dobson 1990:3).

Eckersley (1992a), distinguishes between 'anthropocentric' and 'ecocentric' environmental perspectives. The former is "characterised by its concern to articulate an eco-political theory and practice that offers new opportunities for *human* emancipation and fulfilment in an ecologically sustainable society" (1992a:26). On the other hand, the 'ecocentric' approach "pursues these same goals within the context of a broader notion of emancipation that also recognises the moral standing of the non-human world and seeks to ensure that it, too, may unfold in its many diverse ways" (1992a:26). Elsewhere she claims that "despite the loose equation (most often made

by journalists) between 'Greens' and 'environmentalists', most Green movement activists and Green political candidates are concerned with a broader political agenda that includes yet goes beyond environmental protection to include the full range of social issues" (Eckersley 1992b:158).

In *A Green Manifesto for the 1990s*, Kemp and Wall (1990:1) suggest that "Greens (with a capital G) believe in a new kind of politics of harmony and justice that demands an end to poverty, the introduction of ecological economics...disarmament, real democracy and much else besides". On a similar theme, Dalton (1994:45-50) argues that different types of environmental groups reflect distinct orientations or 'shades of Green'. Environmental mobilisations with a 'conservation orientation' are concerned with "the perpetuation of species, the protection of habitats, and the preservation of a nation's heritage as represented by its cultural monuments and environment" (Dalton 1994:46). However, the 'ecological orientation' "differs from conservationism in its political concerns and fundamental political ideology" (Dalton 1994:46-47). Dalton (1994:47) also maintains that conservationists "generally accept the existing sociopolitical order" while ecologists "advocate a basic change in societal and political relations as a prerequisite for addressing environmental problems".

Milbrath (1984:72) also touches on this theme, claiming that "we must make a distinction between environmentalists who wish to retain the present socio-economic-political system and those who wish to drastically change it". However, he maintains that "Environmental organisations typically try to appeal to both types" (Milbrath 1984:72). Cotgrove (1982:10) makes a similar distinction. He suggests that the "environmentalist movement has been forced to change from a consensual to a conflictual movement, from a concern with reform within a framework of consensual values to a radical challenge to societal values". Others such as Cohen (1985) and Papadakis (1988), note that the 'radicalism' of new social movements is 'self-limiting'. Papadakis (1988:433) points out that the "emergence and durability" of the West German Green Party may be "explained in terms of an attempt to reconcile

innovative with established organisational forms” and “radical goals with reformist political practice”.

Perhaps the most widely recognised difference is between environmentalism understood as a set of sentiments and issue specific attitudes, and environmentalism as forms of activism. Following this distinction, I conceptualise environmentalism in terms of attitudes (concerns) and behaviour (activism). Environmental concerns seem to be widespread, while environmental activism is more socially circumscribed. Environmental attitudes are associated with diverse and often distant objects, such as native forests, wildlife, and soil erosion. Many environmental sympathisers are concerned about endangered species, or wilderness areas they favour protecting, but are not involved in protest activities. Similarly, while most people in Australia approve of environmental groups, very few actually join these groups or participate in their activities.<sup>15</sup> Joining and/or participating in environmental groups is a behaviour that demonstrates a higher level of commitment to environmentalism than purely ‘attitudinal’ concern over an environmental issue. It typically requires physical effort, may involve a degree of danger, and on some occasions even leads to incarceration.

These two aspects of environmentalism are operationalised as dependent variables in Chapters 5 to 7. I turn now to the classic explanatory accounts of politics, where political behaviour is explained in terms of key political cleavages and their associated social bases.

### **The ‘classic’ social base model**

Political sociology is built upon the keystone of socio-structural explanation, whereby the main political cleavages and the institutions that represent them are seen as reflections of some historically shaped major social divisions. Consequently,

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<sup>15</sup> Lowe and Goyder (1983:9) suggest that these sympathisers or ‘attentive public’ are part of the environment movement as they share the values of the movement.

It should be stressed that the distinction between attitudes and behaviour is ideal. Favourable attitudes toward the environment may increase one’s propensity to become involved in an environmental group. However, joining an environmental group does not necessarily imply active participation, and although voting for a green party is certainly a behaviour, it is one that does not require a high level of commitment. The distinction between ‘attitudinal’ and ‘behavioural’ aspects of environmentalism is explored in more detail in Chapter 5.



modern Western politics - conventional and unconventional - has been traditionally analysed in political sociology<sup>16</sup> by reference to major social cleavages and their respective socio-structural referents or 'social bases'. The notion of a 'social base' implies that specific social locations - class, religious, regional, ethnic, or urban/rural - form the base 'grid' for political-ideological cleavages. The major parties and movements reflect these cleavages and represent the interests and outlooks of the structurally shaped and organisationally elaborated social referent-categories (Lipset and Rokkan 1967, Lipset 1981).

Such accounts, supplemented by explanations in terms of 'political culture',<sup>17</sup> have predominated in political sociology since the late 1950's, with social class interpretations by far the most prevalent in the analyses of politics in modern Western nations. MacIver (1947) cited in Alford (1963:38) suggests that "the party-system is the democratic translation of the class-struggle. It postulates national unity beneath the divisions of class [and] the rationalisation of class interests so that these can make appeal on the grounds of their service to or compatibility with the national interest". Robert Alford (1963:38), agrees that in "the modern democratic state, the political parties have developed largely as instruments of various class interests". These structural, 'social base' explanations came to form a 'paradigm' in political sociology, largely due to Lipset's ([1960], 1981) seminal work, *Political Man: The Social Bases of Politics*. This theme is also present in the work of Bendix and Lipset (1966), Lipset and Rokkan (1967), and others. While the popularity of class accounts among Western scholars is relatively new, their origin is quite old. The inspiration for these structural interpretations lies in the classical works of the nineteenth century 'founding fathers' of sociology, especially Karl Marx and Max Weber.

Marx maintained that social relations, including political relations, were based upon economic (especially property) relations, and that social change was propelled

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<sup>16</sup> For a critique of political sociology see Sartori (1969).

<sup>17</sup> 'Political culture' accounts can be seen as supplements to structural 'social base' accounts (see Almond and Verba 1963, Almond and Verba 1980; for critique see Przeworski and Teune 1970). McAllister (1992:21) notes that "Much that could not be explained about political behaviour in contemporary political systems using other concepts was attributed to political culture".

by conflicts between major classes with opposing class interests. Although he never fully elaborated his class schema, Marx (1977b) defined class by relationship to the dominant means of production. However, as Crompton (1993:28) points out, Marx also insisted that classes (*Klasse für Sich*) are “real social forces with the capacity to transform society”.<sup>18</sup>

While class was regarded by scholars sympathetic to Marx as the most important base of politics in modern Western capitalism, it was by no means seen as the only one. Religious and ethnic-territorial divisions also had a strong impact on political conflict, and were usually seen as reflecting status groups and categories (Lipset and Rokkan 1967).

If Marx was credited with laying the foundations of class accounts of politics, status interpretations of politics can be attributed to Max Weber. For Weber (1968:306), status groups were a “plurality of persons, who within a larger group, successfully claim...a special social esteem”.<sup>19</sup> While he did not deny the importance of class and class conflict, Weber suggested that both stratification and political conflicts in modern Western capitalism also reflect status interests (*ideal* interests) and institutional-organisational divisions.<sup>20</sup>

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<sup>18</sup> Marx was primarily interested in the impact of class-actors as the main agents and the driving forces of historical transformations. As Marx and Engels (1979:79) stressed in the opening of the *Communist Manifesto*, “The history of all hitherto existing society is the history of class struggles”. According to Marx, social change occurred when the established ruling classes were challenged by politically maturing emergent classes. Under a capitalist system, the state was effectively controlled by, and acted in the interests of the ruling class, thus maintaining the status quo (1977a). However, Marx predicted the ultimate demise of capitalism, through the mobilisation of the numerically stronger working class realising its ‘true’ interests - determined by its objective class position - and rising up to overthrow its oppressors. Therefore, politics for Marx was always class politics. He was concerned mainly with ‘the two great classes’ of bourgeoisie and proletariat in his writings on capitalism, and although he refers to a plethora of classes in ‘The Eighteenth Brumaire of Louis Bonaparte’, he did not set forth an actual class schema.

<sup>19</sup> Status groups based upon ‘social esteem’, emerge “by virtue of their own style of life” (Weber 1968:306). Status groups defined in terms of ‘esteem’ or ‘honor’ may be contrasted with ‘class situations’ which for Weber (1968:302) are based upon “control over goods and skills and their income-producing uses within a given economic order”.

<sup>20</sup> While the ‘state’ for Weber did not act in the interests of any particular class or status group, it was as Orum (1983:64) suggests, “an arena of constant conflict and involves the representatives of a variety of different status groups”. Moreover, it was the struggle of a particular status group (the Protestant divines) for social recognition and ascendancy that laid the foundation for a unique and ‘peculiar’ Occidental rationalism (Weber 1965). Status conflicts also laid the foundation for the subsequent class conflicts, typical of modern Western capitalism. In pre-modern and Oriental societies, however, status conflicts and status politics were more central than class conflicts and class politics. The ascendancy of Chinese mandarins, Hindu Brahmins and medieval European aristocracies were the outcome of status conflicts and status struggles.

The Weberian notions of status group and status conflict have grown into popular explanatory concepts in accounts of political organisations and behaviour (for example, see Turner 1988). In modern societies, Weberians insist, status group interests are often reflected in political preferences, ideological convictions and voting patterns. Political parties are often formed with the specific aim of representing the interests of religious or ethnic groups - both of which are status based. Where distinct parties based upon such status groups do not emerge, the higher status religious and dominant ethnic groups tend to support 'conservative' or rightwing parties, whereas lower status groups are inclined to support parties with reformist policies or a leftwing ideological stance.

The models of politics derived from Weber and Marx were drawn together in more recent accounts of politics. Lipset and Rokkan (1967) and Lipset ([1960] 1981) claimed that modern Western political divisions could be explained in terms of underlying social cleavages that emerged in the post-Reformation period. Such political 'fault lines' included principally class, religious, ethnic-national and urban/rural cleavages, or combinations of these. In the most developed Western societies, politics was divided on the basis of these historical cleavages and their social referents (Lipset 1981).

### **Social cleavages and new politics**

The classic 'social base' accounts as advanced by Lipset and Rokkan, are widely seen as useful for explaining the political configurations in modern western countries until around the 1970's. However, since then, the classic class model of politics has come under question, especially when applied to the 'new politics' and 'new social movements'. Class based interpretations of politics, in particular, have been called into question in recent years, even by Lipset and his collaborators (Clark and Lipset 1991, Clark et al 1993). According to these critical accounts, the political configurations in the West are undergoing a process of change, signalling class dealignment and a weakening or even a decomposition of class and class politics. Clark et al (1993) point to a number of causes: the rise of the welfare state,

diversification of the occupational structure, rising affluence, changing political party dynamics, and the rise of dual labour markets (1993:297-298). Inglehart (1990a), who seems to embrace some aspects of the decomposition thesis, maintains that change is caused by generational shifts in value orientations resulting in a higher emphasis being on quality of life issues, self-actualisation and civil liberties. These shifts, in turn, lead to new norms of political participation and participatory activism, new 'third parties', independent politicians and the new social movements - collectively known as the 'new politics'.<sup>21</sup> Dalton (1988) offers a less 'culturalist' account. He outlines a number of factors which contribute to class/partisan dealignment and the decline of cleavage politics in advanced Western societies. These include: unprecedented economic growth, the expansion of governmental control over economic and social issues, the development of the welfare state, restructuring of the labour force, increased urbanisation, increased education, and the growth of the electronic mass media (1988:5-7). The most important aspects of change for Dalton (1988:7) are the increases in the level of education which leads to "growth in political skills and resources, producing the most sophisticated publics in the history of democracies".

Perhaps the most comprehensive and radical account of political change comes from neo-Marxist quarters. Offe (1985) goes so far as to suggest that a shift in 'political paradigms' has been occurring. He sees new politics as cutting across the old political divisions. The new politics, comprising new social movements (environmental, human rights, peace, disarmament etc.), and the new (especially 'green') political parties, 'challenge the boundaries' and the content of 'old' conventional politics (Table 1.1). One aspect of this challenge is the changing nature of social actors and changing social foundations of politics.

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<sup>21</sup> Poguntke (1993:9) defines the new politics as "the interrelated extension of *participatory dispositions and techniques* and the *partial change* of the *political agenda* through the surge of a new set of political demands".

**Table 1.1: Offe's Old and New Political Paradigms**

	<b>old paradigm</b>	<b>new paradigm</b>
actors	socioeconomic groups acting <i>as</i> groups (in the groups' interest) and involved in distributive conflict	socioeconomic groups acting not <i>as</i> such, but on behalf of ascriptive collectivities
issues	economic growth and distribution; military and social security, social control	preservation of peace, environment, human rights, and unalienated forms of work
values	freedom and security of private consumption and material progress	personal autonomy and identity as opposed to centralised control etc.
modes of action	(a) internal: formal organisation, large-scale representative associations	(a) internal: informality, spontaneity, low degree of horizontal and vertical differentiation
	(b) external: pluralist or corporatist interest intermediation; political party competition, majority rule	(b) external: protest politics based on demands formulated in predominantly negative terms

Source Offe (1985:832)

### **New politics, class and partisan dealignment**

Under what Offe (1985) terms the 'old political paradigm', politics in advanced Western societies is dominated by 'catch-all' or *volksparteien* (people's parties), which ideally represent the broad interests of the major industrial classes. These large parties function as "major political stabilisers by anchoring the loyalties of large sections of the population, and by stabilising voting patterns" (Crook et al 1992:88). There are a number of reasons for this political stability. Political parties traditionally garner interest-based mass appeal, with political cleavages running mainly along class lines. Left-leaning social-democratic parties are supported by the working classes, while liberal-conservative parties represent the middle and upper classes (Lipset 1960, 1981). As a result of these class linkages, the major parties enjoy strong and enduring voter loyalties. The large 'catch-all' parties actively cultivate their 'natural' constituencies of stable supporters, through systematic appeals based upon class

rhetoric and class issues. Political 'partisans' feel "affective ties to political parties" and their support is therefore relatively reliable (Baker et al 1981:195). A minority of the electorate are swinging voters who bring about changes in government, yet by and large political life is relatively predictable.

Over the last few decades, however, this predictability has been diminishing. Partisan support is on the decline, and socio-political configurations in the West are undergoing serious transformation. The great industrial classes are losing their coherence and are no longer closely linked with the major political parties.<sup>22</sup> There are increasing numbers of new political parties and independent candidates, and social movement protest activities occur on a regular basis. Most importantly, these ascending parties, groups and movements, can not be linked in terms of composition and concerns with any of the major 'industrial classes'.

These changes give rise to theories of class and partisan dealignment (Crewe and Denver 1985, Dalton et al 1984, Rose and McAllister 1985, Dalton 1988). The class dealignment thesis postulates a "progressive divorce between the main industrial classes and their organised political representation" (Crook et al 1992:139). Empirical evidence based on the Alford index of class voting led Minkenburg and Inglehart (1989:84) to conclude that "social class voting has declined almost continually in all major Western countries".<sup>23</sup> Similar conclusions have been reached by Rose and McAllister (1985), Clark and Lipset (1991:403) and Clark et al (1993:312). Crook et al (1992:139) identify "four overlapping processes" involved in the decline of class voting. These processes are

the fragmentation of the major parties; declining consistency in voting; a declining identification with, and allegiance to, the major parties which traditionally represent class interests; and the decreasing polarisation of the old class/party blocs (Crook et al 1992:139).

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<sup>22</sup> The changing structure of the workforce is an underlying factor here, as, due mainly to automation, the manual sector has decreased and the non-manual increased in size over time. Major parties have consequently attempted to broaden their support base, and now aim to capture votes from all sectors of the electorate.

<sup>23</sup> Alford's index is calculated by subtracting "the percentage of persons in non-manual occupations voting for the Left parties from the percentage of persons in manual occupations voting for Left parties" (Alford 1963:79-80).

The dealignment process also involves a decline in partisanship. Crewe and Denver (1985:17) note that “[I]n a period of partisan dealignment, the pool of relatively unattached electors swells: more voters are ‘up for grabs’ ”.<sup>24</sup> Dalton (1988:188) suggests that “voters are not simply defecting from their preferred party in one or two elections. Partisan dealignment means that there is more than just a temporary erosion in partisan loyalties.” A decrease in the level of trust in the major political parties is concomitant with the dealignment processes. However, this “growing cynicism” toward the major parties has not led to “political alienation and apathy” but to “a preference for expressive participation among the young, educated white-collar categories” (Crook et al 1992:139).<sup>25</sup>

Perhaps the most important reason for this trend toward dealignment is the “failure of parties to deal successfully with contemporary political issues” (Dalton 1988:191). Inglehart (1990a:357) argues along similar lines, suggesting;

the established political parties came into being in an era dominated by social class conflict and economic issues, and tend to remain polarised on this basis. But in recent years, a new axis of polarisation has arisen based on cultural and quality of life issues. Today, the established political party configuration does not adequately reflect the most burning contemporary issues, and those who have grown up in the postwar era have relatively little motivation to identify with one of the established political parties.

While support for the major parties has declined in recent years, support for Left-Libertarian parties - which do not fit the cleavage model of politics, especially the class model - consistently increases (Kitschelt 1990). The political void created by the large parties neglect of the new issues partially explains the rise of these new politics parties. The value-based claims of new politics supporters are often incompatible with, or unable to enter the instrumentally rational domain of conventional politics. As Berger notes, “[T]he new agents, conflicts and values are political; but they can not be integrated into traditional political institutions” (1979:40).

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<sup>24</sup> They qualify these remarks by suggesting “this does not necessarily undermine the established party superstructure, let alone transform it in a predictable direction. The main parties might grab votes from each other” (Crewe and Denver 1985:17).

<sup>25</sup> Participation among new politics supporters also differs in that it tends to be unconventional.

## Key aspects of environmental new politics

Environmentalism is an element of this emerging configuration of 'new politics'. The major differences between the 'old' and 'new' political configurations are outlined in an ideal typical sense in Table 1.2. The major points in Table 1.2 set the agenda for discussion in this section.

**Table 1.2: Aspects of 'Old' and 'New' Politics**

	<b>Old Politics</b>	<b>New Politics</b>
Political forms	'Catch-all' parties milieu parties <i>volksparteien</i>	new politics, third or left-libertarian parties, independents
Extra-political forms	corporatist bodies lobby groups pressure groups	new social movements issue networks (public) opinion circles
Organisation	bureaucratic, hierarchical	consensual, open
Legitimacy	legal rational authority	'reputational' legitimacy
Leadership	organisation based elites	influential 'leaders'
Value preferences/goals	materialist economic/physical security stability, public order	postmaterialist self expression quality of life
Issues	instrumental, pragmatic - economic-employment - inflation - government interventionism - social welfare	value-driven - environmentalism - anti-nuclear - civil, women's, minority rights
Social Bases	class, religious, regional, ethnic, rural/urban	'new class'? generational differences/values? status blocs/lifestyles?

Sources: Dalton 1988, Veen 1989, Müller-Rommel 1990, Kitschelt 1989, Inglehart 1990a, Pakulski 1991.

### *Political organisations: old and new*

Major *volksparteien* (people's parties) dominated politics in the West under the 'old' political paradigm (Veen 1989). However, in recent times smaller 'new politics' and 'Left-libertarian' parties also play an important role (Müller-Rommel 1990, Kitschelt 1989).<sup>26</sup> These small new, left-Libertarian or 'third parties' issue an

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<sup>26</sup> Political commentators are at odds as to exactly when the new political configurations began to emerge.



electoral challenge to the established parties, to the extent that many Western political systems are transforming into mixed party systems (Müller-Rommel 1990, Kitschelt 1990).<sup>27</sup> New politics parties, together with the new norms of political participation and issues espoused by new social movements, undermine the control of the milieu parties, and the integrity of corporatist politics based upon this control (Baker et al 1981, Dalton 1988, Gibbins 1989, Keuchler and Dalton 1990, Crook et al 1992).

The dominant Western political system, described by Kitschelt (1993:20) as the 'organisational democratic model', "combines proportional representation of parties in the legislature, a functional division of government power, parliamentarism, bargaining and cooperation between party elites, and top-level ties to important interest groups".<sup>28</sup> New politics parties, by contrast, tend to be more participatory than representative. Their political agendas also differ from those of conventional political parties. They exhibit "strong concerns for equal rights" and civil liberties, are pro-ecological, anti-nuclear, and often demand "unilateral disarmament" (Müller-Rommel 1990:217). These 'left-libertarian' parties "oppose the priority given to economic growth in public policy making, an overly bureaucratised welfare state, and restrictions placed on participation which confine policy making to the elites of well organised interest groups and parties" (Kitschelt 1990:9).<sup>29</sup> Baker et al (1981:294) note that "where the old parties have refused or been unable to incorporate New Politics goals, new parties have been formed to specifically cater to New Politics voters".<sup>30</sup> Support for these left-libertarian or new politics parties is strong among supporters of new social movements. Papadakis (1988:433) notes the link between

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<sup>27</sup> This is more apparent in many European countries where electoral idiosyncrasies allow small parties to win more seats. In Australia, the Australian Democrats and Greens remain small parties, although both parties have had an impact upon Federal (in the Senate), and state politics (Tasmanian House of Assembly).

<sup>28</sup> Kitschelt (1993) also defines two other democratic types, the 'liberal democratic' and 'direct democratic' models. The 'organised democratic' system is common in European democracies, whereas the USA is an example of Kitschelt's 'liberal democratic' model. 'Direct democratic' processes are typically found in new social movements.

<sup>29</sup> The terms 'Left Libertarian' (Kitschelt 1989, 1990) and 'New Politics' parties are used here interchangeably, in accordance with Müller-Rommel (1990:211).

<sup>30</sup> Although it is noteworthy that the major parties have developed environmental policies in order to win the 'green' vote. In Australia, the federal ALP, for example, successfully pursued the green vote throughout the 1980's.

the Green Party and the peace and ecology movements in West Germany. Müller-Rommel (1990:218) suggests that “in many cases we can detect alliances between New Politics parties and new political movements. In this respect, the New Politics parties differ substantially from the established parties.”

It is important to stress that while old and new political configurations may coexist, ‘old politics’ remain dominant in all developed societies, including Australia. As Papadakis (1993:3) notes, “old politics are by no means dead or irrelevant”. Baker et al (1981) explain that old politics remain dominant because old political issues are still the most important for the majority people. They point out that “most voters are still primarily concerned with the economic and security issues of the Old Politics” (1981:293). However, new politics parties can have a destabilising effect upon the two party system. The new parties and independents representing new political issues may erode the major parties’ stronghold on power, and encroach upon their once exclusive social constituencies. In some instances, such as with the Australian Labor Party, major political parties may attempt to assimilate new political issues into their policy agendas. However, as McAllister and Studlar (1995:213) warn, such a ploy may add to the “long-term instability of their party system”.

### *Extra-political forms - new social movements*

Under the old political configuration, elected governments alone are legally empowered to control state and military affairs. Yet they are often influenced by various lobby and pressure groups which are not directly accountable to the people. Such groups seek to influence government decision-making in order to pursue their own interests. For example, trades union press for higher wages or improved working conditions; business groups lobby for industrial reform or reduced company taxation. Corporatist agreements, particularly tripartite agreements involving government, business and trades union, are common in many modern Western

democracies.<sup>31</sup> Under these corporatist arrangements powerful extra-political groups are able to monopolise political decision-making and policy formulation.<sup>32</sup>

Old political institutions are organised (in an ideal-typical sense) to provide the most efficient *means* of obtaining desired *ends*.<sup>33</sup> The *Zweckrational* or instrumental issues and claims of old politics are dealt with by bureaucratic organisations which are specifically designed for such purposes (although in practice many question their efficiency). The instrumental nature of old political claims are compatible with, and indeed require, organisations that are “social units (or human groupings) deliberately constructed and reconstructed to seek specific goals” (Parsons cited in Etzioni 1964:3). Old politics tends to be pragmatic politics, where deals are made and compromises reached in order to achieve desired ends.

While new social movements share some characteristics with the lobby and pressure groups of old politics (for example, they seek to influence governmental decision making), they are arguably driven less by sectional interests and to a greater extent by higher order values and globally important issues. The lineage of the new social movements may be traced to the 1960’s student movements in the USA and Europe (Dalton 1988), and to the American civil rights movement (Burgmann 1993). Dalton et al (1990:3) suggest that the student movement “marked the beginning of a broader wave of social change that has affected virtually all advanced societies”. This new wave of social movements (eg. environmentalism, human rights, peace, women’s, nuclear disarmament), reflect issues that are not sectionally based, unlike those of the ‘old’ or ‘populist’ (Offe 1985:837) fascist and labor movements. The new social movements “signify a shift from group-based political cleavages to value- and issue-based cleavages that identify only groups of like minded people” (Dalton et

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<sup>31</sup> Crook et al (1992:137) suggest that “bureaucratic-corporatist politics” is focused on “stability, freedom, security, and economic growth, stressing national security, and translating value commitments into the language of sectional interest and appropriate administrative procedures”. For Wilson (1990:69) the “neo-corporatist model stresses the exclusive relationships between a handful of privileged groups and the state”; the corporatist model “posits the presence of a single group for each interest sector: labor, employers, farmers, veterans, and so on”.

<sup>32</sup> Crook et al (1992:137) suggest that new politics “emerged in response to the form, content, and idiom of the bureaucratic-corporatist politics, in particular in opposition to subtle constraints and restrictions coded into the political institutions and cultures of liberal corporatism”.

<sup>33</sup> Which Weber (1947:115) refers to as *Zweckrational* action.

al 1990:12). They tend to be non-hierarchical, anti-bureaucratic, loosely structured entities, comprised of voluntary supporters rather than members, and may be defined as “recurrent pattern[s] of polymorphous and value-charged protest activities” (Pakulski 1993a:133).

New social movements are ‘new’ because the issues they raise are new. Inglehart (1990b:63) maintains that they “are new not only in their goals, but also in their political style and in the factors that mobilise their activists”. In a similar vein, Nedelmann (1984:1033) suggests this ‘newness’ lies in “the differentiation of types of movement, the differentiation of means of action, the differentiation of types of demands raised, and the differentiation of types of interaction patterns between these different movements”.

The ‘newness’ of new social movements also stems from the manner in which they are able to mobilise public support, most notably via the mass media. They attempt to change the attitudes of the mass public, but seek to achieve this mainly through ‘unconventional’ political activities, such as protests, rallies and staged media events. Movement ‘leaders’ skilfully utilise symbols and slogans. Symbol manipulation serves to mobilise diverse groups of supporters, who are unified by a common slogan or banner, such as ‘NO DAMS’. Movement issues are often ready made ‘stories’ which are highly suitable for media consumption. New social movements are highly critical of opponents, and new political issues have a tendency to be controversial, which further adds to their media marketability.

The protest activities of new social movements not only sends a ‘loud’ message to the mass public, but also serves to mobilise potential activists and to promote solidarity among existing activists. However, protest demands “are articulated in mostly negative logical and grammatical forms, as indicated by key words, such as ‘never’, ‘nowhere’, ‘end’, ‘stop’, ‘freeze’, ‘ban’ ” (Offe 1985:830). In a sense, this could be viewed as an attempt to change established norms. However, new social movements may rarely be said to have a plan for what ‘should be’, they are more effective at stating what ‘should not be’. Adopting a ‘negative’ stance serves to

enhance the mobilisation of potential supporters, as it is easier to mobilise people from diverse backgrounds to take a negative stand than to achieve positive solidarity.<sup>34</sup>

New movement activists do not attempt to *change the state* in a broad sense. They may be 'anti-systemic' in their orientations, but tend to work within established political frameworks. Even though they employ unconventional means of protest, these are usually aimed at changing government policy, rather than changing the system of government. The influence of new social movements, then, stems not from direct participation in the conventional political system, but from bringing indirect pressure to bear on government and business elites, via public opinion (Baker et al 1981).

New social movements are value driven to a greater extent than 'old' social movements. Participants often pursue movement goals (in so far as social movements have clear goals) because of a belief in their intrinsic worth. In the case of ecological movements, the environment is seen as important in its own right, not because of its potential use value. In Weberian terms, social movement supporters act in a *Wertrational* (value-rational) rather than a *Zweckrational* manner (Weber 1968:24-25).

Not everyone agrees on the 'newness' of new social movements. Poguntke (1993:10) for example, maintains that "apart from the ecological issue and the strong concern with individual self-determination and self-realisation-most goals associated with the New Politics are not recent inventions". He suggests that what is new is "the specific combination of goals that originate from diverse political camps, as well as their radicalism and the higher salience attributed to them which makes the New Politics a political tendency in its own right" (Poguntke 1993:10). However, while also reluctant to accept that new social movements are really 'new', Miliband (1989:97) concedes,

it is clear that the new social movements of recent decades have been immeasurably larger, stronger, more vigorous and ambitious, and also more effective, than many of their predecessors. In this sense, they are

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<sup>34</sup> If supporters of particular new social movement supporters are asked what they stand *for*, their views would probably diverge significantly, given the diverse nature of their constituency.

'new', and represent a remarkable phenomenon, with a deep reach into the moral and political culture of contemporary societies.

### ***Organisation, legitimacy and leadership***

Under the old political configurations, elected governments have legitimate power of command within institutional structures. Governments, political parties and bureaucracies in Western democracies are all hierarchically organised. Political institutions, and indeed bureaucratic, business and trades union are dominated by organisational elites - "persons with the power to affect organisational outcomes individually, regularly, and seriously" (Higley et al 1979:3). A prerequisite of elite power, as Almond and Verba (1989:343) point out, is that the "involvement, activity, and influence" of the voting public is limited. Under the old political paradigm, voters are "relatively passive, uninvolved, and deferential to elites" (1989:343). This provides elites with the autonomy necessary "to be powerful and make authoritative decisions" (1989:343).

In Western countries, the elites of 'old politics' - party and parliamentary leaders, pressure group heads and high parliamentary officials - are able to exert their power directly through the hierarchical chain of command.<sup>35</sup> Elite commands are the embodiment of legal-rational authority which rests upon "a belief in the "legality" of patterns of normative rules and the right of those elevated to authority under such rules to issue commands" (Weber 1968:215). Elite members also have considerable indirect influence through social networks and via the mass media. Although they are constrained within organisational boundaries, this very constraint, somewhat paradoxically, allows elite members considerable autonomy in decision making. Elites are insulated from the demands of those they control by their strategic location at the top of organisational structures, and the legitimate authority this location affords. Elite members are therefore able to make decisions and issue directives with a high degree of certainty that these directives will be adhered to by subordinates.

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<sup>35</sup> Weber (1947:139) defines power as "the probability that one actor within a social relationship will be in a position to carry out his own will despite resistance, regardless of the basis on which this probability rests".

Leadership under the new political configurations differs from the organisational elites of old politics. Decision making in new social movements is ideally achieved on a consensus basis and tends to lack structured authority lines (Gundelach 1984, Dalton 1988). Yet even though “decision making is collective” and “there are no bureaucratic leaders” (Gundelach 1984:1065), social movements do have organisational cores (Holloway 1986, Doyle 1989) and ‘leaders’ do exist. These ‘leaders’ often have significant input into decision making processes, as they are adept at setting the agenda for discussion and subtly influencing the consensus process (Tranter 1995:91). The authority of new social movement leaders often resembles charismatic or ‘reputational’ authority. Leaders have esteem based influence rather than authority over other participants. Influence stems from the personal prestige leaders gain as activists, expert advisers, spokespeople or organisers within the movement or new politics party. This influence may also be somewhat ephemeral, as it is dependent upon the continuing respect of other social movement participants (Tranter 1995).

Left-libertarian or new politics parties also “display a strong preference for participatory party organisation” (Müller-Rommel 1990:217), and tend to be anti-hierarchical and non rule bound. Similar to the new social movements, decision making in new politics parties is decentralised,

party activists hold formal leadership positions for brief periods at a time. Leaders engage in a continuous exchange of information with both rank-and-file militants and activists in left-libertarian movements and can be recalled at any time. The parties keep themselves open to new ideas and demands and base their decisions on discussions rather than on preferences of party elites (Kitschelt 1989:67).

Organisational elite members have authority, but they are constrained within organisational boundaries. New politics ‘leaders’ lack organisational boundaries, but are constrained by a lack of authority. This lack of structured authority in new social movements means that in a sense they are “incapable of negotiating” (Offe 1985:830, Frankel 1987). Movements are unable to negotiate, firstly, because the ‘leaders’ can not guarantee that supporters will follow their advice and abide by agreements that are

made. Secondly, new social movements “do not have anything to offer in return for any concessions made to their demands” (Offe 1985:830).

### *Values and issues*

The ‘end of ideology’ thesis (see Bell 1960, Waxman 1968), advances the notion that “the old ideologies of the right and the left had lost their relevance and force” (Abercrombie et al 1988:86). It also proposes that advanced Western societies are “characterised by a consensus and by a pragmatic approach to the remaining problems of the distribution of resources” (Abercrombie et al 1988:86). The values that typify old politics not surprisingly also reflect this instrumentalism and pragmatism. They include freedom, stability, economic growth and security, and also “noneconomic security...the need to maintain a traditional social order and domestic tranquillity” (Baker et al, 1981:141). Such values underlie the political issues and party platforms of old politics.

Some political commentators claim that the value orientations of new politics supporters differ significantly from those of their old political counterparts. Dalton et al (1984:188), for example, suggest that “values have been changing in a number of advanced industrial societies and...the new values are linked with new attitudes toward politics, new styles of participation, and changing issue and party preferences.” In a study of the (West) German Greens, Veen (1989:42) notes that “they have no regard for traditional values; have a low esteem for law and order; and consider the fulfilment of duty, self-discipline, thrift and hard work to be less important virtues than do the rest of the population. On the whole, they reject achievement, wealth and career-mindedness”.

Others argue that what has changed is not values *per se*, but the way in which they are prioritised. Offe (1985:850) argues that a shift has occurred in the “selective emphasis” supporters of new politics place upon some values over others. Inglehart (1977, 1990a) is more specific; he notes a gradual change in value orientations and priorities, from what he terms a ‘materialist’ configuration, where the primary concern



is with “economic and physical security”, to a ‘post-materialist’ configuration, where priority is given to “self expression and the quality of life” (Inglehart 1990b:47).<sup>36</sup>

Old political issues are predominantly related to economics and social welfare. Some economic examples include government intervention in business, job security, unemployment and inflation. High priority is also given to social welfare issues such as education and medical care (Barnes et al 1979:412, Baker et al 1981:293). By contrast, the new political issues include:

Freedom of speech for minorities, access to the decision-making machinery of the state, the ability to participate in politics, and, if necessary, to resort to demonstrations and other forms of elite-challenging political behaviour (Baker et al, 1981:141).

Dalton (1988) suggests that new political issues are aligned with ideological orientation. He notes that the “New Politics dimension involves conflict over a new set of issues-environmental quality, alternative lifestyles, minority rights, participation, and social equality. This dimension represents the cleavage between proponents of these issues, the New Left, and citizens who feel threatened by these issues, the New Right” (1988:133). New political issues may also stem from problems typical to modern Western societies, such as “the dangers of nuclear energy...women’s equality...and the need for peaceful international coexistence” (Baker et al 1981:141).

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This overview of new politics highlights the novelty of the phenomenon and helps to locate the central issue of this research - the social base question - in a broad theoretical context. The key point I wish to stress is that due to the publicity and interest generated by the ‘new politics’ debates, the notion of ‘social base’ has gained a new urgency. This is further examined in the final section here.

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<sup>36</sup> Inglehart’s thesis is outlined in detail in Chapter 3.

### **Social bases of new politics - the current debates**

Under the classical political sociology 'paradigm' popularised by Lipset ([1960] 1981), and Lipset and Rokkan (1967), class struggles do not lead to revolutionary change. Rather, electoral contests are seen as "the expression of the democratic class struggle" (Lipset 1981:230).<sup>37</sup>

More than anything else the party struggle is a conflict among classes, and the most impressive single fact about political party support is that in virtually every economically developed country the lower-income groups vote mainly for parties of the left, while the higher income groups vote mainly for parties of the right (Lipset 1981:234).

This social base model has dominated in studies of Australian politics (for example Alford 1963, Aitkin and Kahan 1974). As McAllister (1992:152) points out, "whatever the electoral impact of social group loyalties such as religion, birthplace or place of residence, the traditional view of Australian politics is that class has formed the basis for party political divisions for most of the twentieth century". However, when applied to the analysis of new politics, especially environmental politics and green concerns, it proves less than useful. New political issues find support across a number of social groups, but it is difficult to link these issues with the interests of any particular social group, or socioeconomic category.

One reason for this may be that the groups that represent these new issues reject the notion of 'sectional interests'. New politics cuts itself off from such sectional politics, be they related to class or any other socioeconomic category. Advocates of the new politics stress the universalism of their concerns, and this universalism seems to be reflected in the social profiles of supporters. Students of new social movements tend to agree that participants are "mainly younger, new middle class, urban, highly educated, with new value orientations, and a general left-wing orientation" (Müller-Rommel 1990:217-18). They also tend to be 'social and cultural specialists' (Kriesi 1989:1078), or "employed in human services (teaching, health care, social work)"

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<sup>37</sup> Lipset (1981:230) adapted this phrase from the title of Anderson and Davidson's (1943) book, *Ballots and the Democratic Class Struggle*.

(Kitschelt 1990:10). Yet the (new) middle class background of supporters is not uniform (for example, it includes students), and it can not be seen as an indication that the issues they raise are class related. Offe (1985:833) argues that there are “relatively clear structural determinants of *who* is likely to support the causes and engage in the practices of “new politics”...but the *demands*....are highly class-*unspecific*”. That is, while new politics supporters share similar (middle) class backgrounds, the politics of what has been termed the ‘new middle class’ is “typically a politics *of* a class but not *on behalf of* a class” (Offe 1985:833).<sup>38</sup>

Numerous theoretical claims are advanced to explain the social base of new politics. Because social class accounts pervade sociological explanations of ‘conventional’ politics, it is not surprising that ‘new class’ accounts emerge to explain the support base of new politics. For example, Gouldner (1979) and Eckersley (1989) maintain that entirely new classes form the support base of the new politics. Proponents of the new middle class accounts (for example, Parkin 1968, Offe 1985, Dalton 1988) suggest that support for new politics emerges from certain new sectors of the middle class. The expansion of the public sector has also given rise to ‘statist class’ accounts (Mattausch 1989).

However, these new class accounts of new politics are by no means universally accepted. Turner (1988:44), for example, maintains that “to understand contemporary social movements...we need a theory of status groups and status politics, because the conventional Marxist emphasis on economic power and economic classes is inadequate”. Alternative explanations are also found in value and generational based accounts. Inglehart (1977, 1990a) suggests that new politics emerged from a re-prioritisation of values, where a shift in emphasis on value priorities occurred from a materialist to a postmaterialist configuration among younger generations. Postmaterialist values are said to underlie support for the new social movements, especially green movements.

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<sup>38</sup> This raises the question, ‘is social class an adequate or appropriate explanatory concept to apply to the study of social movements, and the new politics?’ This question is explored in Chapter 2.

Another explanation suggests that change is occurring not only in terms of institutional and ideological decomposition, but also in the very nature of the social bases of politics. Politics seems to be entering a new stage, where the social bases are diverse and fluid. The most radical alternative to the social base accounts - the decoupling thesis - suggests that politics is no longer strongly linked to *any* social base (see Dalton 1988:175).

It is not only the social bases but also the content of new politics that sparks controversies. Contrasted with old politics, the claims made by supporters of the new politics seem to be much more universalistic. The nature of these claims, involving issues such as environmentalism and peace, are not easily construed as serving the interests, especially the material interests of any social segments (Morrison and Dunlap 1986).<sup>39</sup> New politics supporters seek to participate in, and have an influence upon state decision making in order to promote some 'ideal' interests. This may occur directly through public appeals and participation in new social movement protest activities, or indirectly through voting for the Left-Libertarian political parties and independents that represent new politics issues. In the latter instance, new politics voters seek politicians who are supportive of the new value-driven issues, as an alternative to the old political pragmatists who follow sectional interests and toe the party line. This may herald the entry of new values (or value priorities) into the political arena. Changes in value priorities lead to the emergence of new issues of a *Wertrational* nature, issues which are not easily assimilated into conventional political institutions. New political parties, and new social movements appear to be 'new' because they pursue new issues, and rely upon the non-sectional interest base of their supporters. Moreover, new social movements derive their 'newness' from their unconventional protest activities and from their heavy reliance upon the mass media (especially television) to mobilise mass publics.

The study of environmental new politics gives rise to new controversies and also to a paradox. While there is wide recognition of the specificity of the new

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<sup>39</sup> For example, it is difficult to sustain an argument that supporters of ecological movements seek sectional gain from their protest activities.

politics, and of the fact that it does not seem to fit the classical social base models, there are few critical reviews of these models and few systematic empirical attempts to test their utility. This calls for i) a review of the social base accounts of new politics, and ii) a systematic empirical evaluation of these accounts.

## **Chapter 2**

### **Class Explanations of Environmentalism**

Class interpretations and explanations of environmental concerns and activism are the focus of this chapter. Although firmly rooted in the Marxist (and to a lesser extent Weberian) tradition, these accounts owe more to the contemporary paradigm elaborated by Seymour Martin Lipset. Lipset's now classic work, *Political Man: The Social Bases of Politics*, provides an introduction to interpretations of politics in advanced Western societies. After outlining the 'class paradigm', the discussion then moves on to more recent, 'new class' attempts to explain environmental 'new politics'. While distinguishing between the various streams of new class theory used to explain environmental new politics, I also highlight the similarities between these streams, most notably in the manner in which the various 'new classes' are defined and delineated. The final section evaluates critically the new class accounts in terms of clarity and consistency. I conclude that the 'new class' is a stretched and blurred concept, and that new class accounts of environmentalism are vague and/or inconsistent.

#### **Lipset's class paradigm of politics**

Lipset ([1960] 1981) argued that the main political cleavages in Western democracies reflect social class, religious, regional, and to a lesser extent, ethnic and rural/urban divisions. Social class was by far the most important structural division underlying socio-political divisions in Western societies and the most important referent of the major 'milieu' parties and social movements. Lipset (1981:230) claimed that "In every modern democracy conflict among different groups is expressed through political parties which basically represent a 'democratic transition of the class struggle' ". Voters supported political parties whose policies were aligned with their class interests, and party cleavages

mirrored social class divisions in their political-ideological polarisation. Parties that tended toward radicalism or conservatism, represented the ideological ‘left’ and ‘right’ respectively. The notion of a social base of politics served not only as a powerful explanator of voting behaviour, but also as predictor of political attitudes.

More than anything else the party struggle is a conflict among classes, and the most impressive single fact about political party support is that in virtually every economically developed country the lower-income groups vote mainly for parties of the left, while the higher income groups vote mainly for parties of the right (Lipset 1981:234).

Lipset (1981) also maintained that the major ‘extremist social movements’ were socially and ideologically aligned with the principle social classes. He claimed that the “left, right and centre (Communism and Peronism, traditional authoritarianism, and fascism) are based primarily on the working, upper, and middle classes, respectively” (1981:127). These classes formed the core social bases of different types of mass social movements (Table 2.1).

**Table 2.1: The ideological and social bases of ‘extremist politics’ and mass social movements.**

<b>Ideology</b>	<b>Social Base</b>	<b>Political Party</b>	<b>Mass Social Movement</b>
‘Left’	Working class	Social Democrat	Communism, Peronism
‘Centre’	Middle class	Liberal Democrat, Christian Democrat	Fascism
‘Right’	Upper class	Conservative	Traditional authoritarianism

(Source: Lipset 1981: Chapter 5)

Lipset’s ([1960], 1981) ‘class paradigm’ of politics survived as the dominant interpretive and explanatory framework for over 20 years. However, since the late 1970’s, the popularity of Lipset’s classic sociological model of politics has been declining. A number of theoretical debates have emerged

concerning the relevance of class analyses of politics, especially new politics (for example, see Baker et al 1981, Dalton et al 1984, Rose and McAllister 1985, Hindess 1987, Dalton 1988, Dalton et al 1990, Franklin et al 1992, Pakulski 1993a, Pakulski and Waters 1996). Even Lipset himself (Clark and Lipset 1991, Clark et al 1993) began to question the utility of class as the central explanatory concept in political sociology, suggesting it had “declined in its ability to explain social and especially political processes” (Clark et al 1993:293).<sup>1</sup> Yet while Lipset and others pointed to the declining utility of class accounts, many were not so ready to abandon them. While doubts have emerged regarding their explanatory utility, class accounts still have numerous advocates among contemporary analysts of new politics. I begin by outlining the best known examples of these contemporary class interpretations.

### **Contemporary class accounts of environmental new politics**

Many theorists attempt to link the rise of new politics, environmental politics in particular, with the emergence of a *new class*. There are a plethora of ‘new class’ theories.<sup>2</sup> Pakulski (1993a) divides new class accounts into three general types: the occupational-economic ‘new middle class’ represented by authors such as Parkin (1968), Offe (1985), and Dalton (1988); the culturalist ‘new class’ theories of Gouldner (1979), Eckersley (1989), and Inglehart (1977, 1990a); and the ‘statist class’ interpretations of authors such as Mattausch (1989). Whereas the ‘old middle class’ is often conceptualised as a heterogeneous category of small owners and non-manual workers, the ‘new middle class’ is a finer cut, comprised of more clearly circumscribed occupational groups.<sup>3</sup> On the ideological and political spectrum, the ‘new

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<sup>1</sup> Clark et al (1993:311) argue that “The new class both contributes to and helps explain the decline of old class politics...By advancing a universalistic social agenda on issues such as peace and the environment, the new class helps displace specifically economic, class-relevant issues which are traditionally part of ‘class politics’ ”.

<sup>2</sup> The term ‘new class’ is used here as an umbrella term that includes all types of new class accounts (‘new middle class’, ‘new class’ and ‘statist’).

<sup>3</sup> For example, Barbalet (1986:557) points out that the ‘new middle class’ are employed in “administrative, managerial, professional, and semi-professional jobs”, while the ‘old’ middle class consists of “independent shop-keepers, self-employed trades workers, and liberal professionals”. With



middle' class lies somewhere between the 'old middle' class and the working class, with a tendency to support new politics parties (Dalton 1988:154).<sup>4</sup>

While the new middle class is seen as derived historically from the major industrial classes, the 'new class' is seen as a novel category (Pakulski 1993a:140). According to Pakulski (1993a:141), new class accounts arose "Partly in response to the problems experienced in linking the new movements with the major industrial classes". The 'statist' new class is a product of growing state intervention, with its members located in the 'state' or public employment sector (Pakulski 1993a:142). In fact public sector employment is a common defining characteristic of both the new middle and new class accounts (for example, see Parkin 1968, Kristol 1978, Gouldner 1979, Offe 1985, McAdams 1987, Dalton 1988).

Brint (1984), and Phelan and Phelan (1991) locate new class accounts on an ideological dimension, subdividing them into neo-conservative or centrist accounts (for example, Kristol 1972, 1975, 1978, Moynihan 1972, Ladd 1978) and neo-Marxist or new left accounts (for example, Ehrenreich and Ehrenreich 1977, Gouldner 1979, McAdams 1987). Phelan and Phelan (1991:181) claim that the 'neo-conservative' accounts "emphasise cultural and psychological sources of new-class thinking", while the 'neo-Marxist' accounts define the new class "in terms of its economic interest in basing power and privilege on specialised knowledge and educational credentials rather than capital".

A summary of the various new middle and new class accounts are presented in Table 2.2. It serves as an organisational framework for the

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regard to the former group, he suggests "It is generally accepted that a significant proportion of these occupational groups share a number of common characteristics which are sufficiently distinct from those of the traditionally conceived classes of capital and labour to allow them to be treated collectively as a new middle class" (1986:557).

<sup>4</sup> Issues that are of interest to some (Marxian) scholars, such as whether or not the new middle class(es) are actually part of the working class or upper class are not relevant to this discussion. For example, Parkin (1979:16) explains; "awkward questions were raised by the discovery that the social territory vacated by the old petty bourgeoisie was found to be occupied by a newcomer in the guise of the 'new middle class'. The problem posed by this new intermediate stratum arose from the fact that, unlike its predecessor, it was in no sense external to the capitalist productive system but an essential feature of it. Since it was not historically doomed it needed to be incorporated into the general class model"

sections that follow, and also highlights the defining characteristics of various new class accounts discussed below.<sup>5</sup> It must be stressed that I focus only on new class accounts employed to explain environmentalism.

It should be already apparent that these new class explanations of environmental new politics vary broadly in terms of their ideological and theoretical underpinnings. Some maintain that the new class is primarily defined by level of education (Eckersley 1989, Rootes 1995), others by employment in professional occupations (McAdams 1987) or even in terms of certain value priorities (Inglehart 1990a). The various new class accounts differ also in terms of the emphasis placed upon certain defining characteristics of class membership. I examine the various class definitions and new class explanations of environmental new politics, beginning with the 'new middle' class, and moving on to the 'new class' and 'statist' class accounts.

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<sup>5</sup> It is not the aim here to construct an all inclusive review of new class theories, but to analyse those accounts most relevant to this research. The class accounts shown in Table 2.2 are organised on the basis of Pakulski's (1993a) distinction between 'new middle class', 'new class' and 'statist class'.

**Table 2.2: Typology of New Class Types by major Defining Characteristics.**

<b>Author</b>	<b>Education</b>	<b>Occupation Type</b>	<b>Employment Sector</b>
<b>New Middle Class</b> Parkin (1968)	tertiary	professionals and scientists	public sector
Offe (1985)	tertiary	personal service	human service, public sector
Dalton (1988)	-	salaried white collar, civil servants	government, service industry
<b>New Class</b> Gouldner (1979)	tertiary	humanistic intellectuals, technical intelligentsia	-
Ehrenreichs (1979)	mainly tertiary	professional, managerial	mainly state sector
Eckersley (1989)	tertiary	humanistic intellectuals, technical intelligentsia	public sector
Inglehart (1990a)	tertiary	-	-
<b>State Class</b> Kristol (1972, 1975, 1978)	tertiary	scientists, lawyers, journalists planners, criminologists, sociologists, doctors	public, welfare sectors
McAdams (1987)	tertiary	professionals	state sector
Mattausch (1989)	tertiary	social and health professionals	welfare state
Kriesi (1989)	tertiary	medical services, teachers, social workers, arts and journalism	social and cultural areas

### ***‘New middle class’ accounts***

Contemporary versions of the ‘new middle class’ interpretations of new politics can be traced to Frank Parkin’s (1968) study of the Campaign for Nuclear Disarmament. Parkin suggests that the CND is a class driven social movement, yet one with an unusual constituency. In contrast to ‘old’ social movements such as the labor movement, radical *middle* class participants are over represented among CND constituents. CND participants are highly educated, generally young, and tend to be employed in public sector education

and welfare organisations as professionals or scientists.<sup>6</sup> In an attempt to explain the link between occupational location and political radicalism, Parkin (1968:185) suggests

the connection between these particular occupations and political radicalism is to be explained not in terms of the strains created by status inconsistency, nor as a result of individuals adopting the humanistic values generated within the professions, but rather as a result of the tendency for individuals who are *already* radical to enter these fields of employment rather than others.<sup>7</sup>

Parkin (1968:187) argues that CND activists tend to avoid employment which conflicts with their value orientations, and instead choose “ ‘people oriented’ work”, or occupations which “avoid direct implication in the capitalist economic system”.<sup>8</sup> Parkin (1968:145) maintains that the family is *the* primary socialisation agent for radicals, suggesting that “political outlooks and loyalties...formed at a relatively early age, through childhood exposure to parental influences...have a decisive effect on the individual’s political outlook through his adult life”.<sup>9</sup>

Such interpretations have been criticised by Cotgrove and Duff (1980:345), who argue that the “radicalism located in this particular fraction of the middle class is...much more than an emotional satisfaction derived from the expression of personal values in action, as Parkin argued.” They suggest that the “antagonistic values and beliefs within a fraction of the middle class...are

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<sup>6</sup> Byrne’s (1986) cited in Kriesi (1989) replication of Parkin’s study shows similar patterns of support among these groups. Cotgrove and Duff (1981:102-3) suggest that British environmentalists are also employed in “non-productive” service, welfare, and creative occupations.

<sup>7</sup> Parkin (1968:182) rejects the status inconsistency argument as a potential explanation, which suggests that when the consistency of status ranking scores are inconsistent on important indicators (such as education, wealth, occupation, ethnicity), individuals tend to develop “left of centre political attitudes”. Those with ‘leftwing’ attitudes are often over represented among ‘radical’ groups, or social movements. The status inconsistency argument is therefore potentially applicable to the CND, because many activists rank high on education, but lower on economic criteria.

<sup>8</sup> Parkin suggested “[T]he fields of commerce and private industrial enterprise are almost synonymous with capitalism in a way that teaching, medical and social work, and scientific research and the like are not” (1968:187). Capitalist oriented employers were also avoided by CND activists because they were thought to discriminate against those with left wing views.

<sup>9</sup> The parents of many activists were interested in politics, with many traditional supporters of left wing parties (Labor or Communist). The political values of CND activist’s parents were reflected in the values of their children, and there were similarities between the political outlooks and voting behaviour of activists and their parents (Parkin 1968).

outside the capitalist mode of production and cannot be assimilated to one or the other of the two main contending classes” (Cotgrove and Duff 1980:345). Such groupings therefore “constitute a potentially radical opposition to industrial capitalism” (1980:345).

Parkin’s conceptualisation of a radical middle class is also problematic. By referring to the value orientations of activists, rather than participants’ socioeconomic interests, Parkin transforms the new middle class into a sociocultural rather than a socioeconomic grouping. In fact Pakulski (1993a:140) suggests that “if styles, norms and ethos reflected in movement activism are products of specific socialisation patterns and life-styles, the concept of status group, rather than class, appears to be more appropriate for explaining their origins and persistence”.

Some attempt have been made to salvage the new middle class interpretations of new politics. Offe (1985:833) suggests that new social movements have a “new middle class core of activists and supporters”. The new middle class is characterised by “high educational status, relative economic security (and, in particular, experience of such security in their “formative years”) and employment in the personal-service occupations” (1985:833). Yet for Offe, new social movements, especially the environmental and anti-nuclear movements are not only supported by new middle class participants. He argues that the social base of these social movements consists of three main groups. There are the core activists, who are predominantly drawn from the new middle class, “especially those elements of it which work in the human service professions and/or the public sector” (1985:831). There are also “elements of the old middle class”, including “independent and self employed” groups such as “farmers, shop owners and artisan-producers” (1985:834). Offe (1985:834) suggests that the “immediate economic interests” of these elements of the old middle class, “often coincide with (or least diverge from) the concerns voiced by the protest politics of new social movements”. Finally, there is a “category of

the population consisting of people outside the labor market or in a peripheral position to it" (1985:832). This latter category Offe (1985:834) refers to as the 'decommodified' groups: those who are "not defined directly in their social situation by the labor market and whose time budget, consequently, is more flexible".<sup>10</sup>

By extending the social base in such a manner, Offe's account is resistant to empirical rebuttal, as almost any mildly radical political activity in modern Western societies may be linked with the vague and broad social bases he identifies. Moreover, Offe (1985:833) contends that the politics of the new middle class are the politics 'of a class', but not 'for a class'; their political activities are not conducted in the material interests of that class. New social movements are therefore not driven by class interests. In fact it would be difficult to maintain that new social movements *could* act in the class interests of their participants, given both the universality of their concerns and the diversity of their constituency (Poguntke 1993:32).

Other new middle class accounts, such as Dalton's (1988:154), explain that the expansion of the new middle class is due to postwar growth in government employment and the service industry, to the extent that it "constitutes the largest sector of the labor force in most Western democracies, even exceeding the size of the traditional working class" (1988:154). For Dalton (1988:154), the new middle class is aligned with neither the bourgeoisie nor the proletariat, but "consists primarily of civil servants and salaried white collar employees". He points out that while members of the new middle class have lifestyles that differ from those of the traditional working class, they are not large scale owners of capital. On a left/right scale, the 'new middle class' falls between the working class and the old middle class. Its members are more

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<sup>10</sup> The decommodified group includes "students, middle class housewives, the unemployed" and retired people (Offe 1985:834). The temporal flexibility and autonomy enjoyed by members of this 'decommodified' or 'peripheral' group, allows them to "spend considerable amounts of time on political activities, something that they share with the often flexible time schedules of middle class professionals" (1985:834).

closely aligned with new political issues, and less concerned in the economic issues of 'old politics' (Dalton 1988:154).

Support for new political issues is also reflected in voting tendencies, as "the new middle class gives disproportionate support to parties that represent a New Politics ideology: the West German Greens, French Ecologists, and the SPD/Liberal Alliance in Britain" (1988:154).<sup>11</sup> Dalton (1988:155) suggests that this support for new political issues (for example, environmental protection, women's rights, social issues, disarmament) and new politics parties, "is a key element in the changing political alignments of advanced industrial societies". Yet Dalton's (1988:157) findings "also indicate a narrowing of class voting over time". In agreement with Inglehart (1977, 1990a), Dalton (1988:172) suggests that "the long standing class cleavage is being challenged by a new values cleavage" that can not be clearly linked to the major industrial classes.

### *'New class' accounts*

New class accounts depart more radically from the classic paradigm by suggesting the formation of an entirely new social class category. In a work devoted entirely to the new class theories, Bruce-Briggs (1979:1) claims that the usage of the term in America stems from Milovan Djilas' work *The New Class*, first published in English in 1957. Bruce-Briggs (1979:1-5) also maintains that the American usage of the term gained popularity due to the influence of three influential authors; Moynihan (1972), Podhoretz (1972) and Kristol (1972). All three saw the new class as a threat to liberal democracy, as a radical social formation consisting mainly of critical intellectuals.

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<sup>11</sup> However Dalton's (see 1988:155 Table 8.1) own data seem to offer at best ambiguous support for his claims. According to Dalton's (1988:155) figures, Green party support in West Germany is stronger among the old middle class than the new middle class, while in France, 'old' and 'new' middle class support for the Ecologists are identical. It is only in Great Britain that support for the Liberal/SPD alliance is strongest among the new middle class. However, his suggestion that the SPD/Liberal alliance actually represents a "new politics ideology" is certainly questionable (1988:155).

Szelenyi and Martin (1988) identify “three waves” of new class theory, i) the anarchist theories of the intellectual class (1870-1917) (for example, Bakunin 1966, Machajski 1937), ii) the technocratic-bureaucratic class theories formulated in 1930’s, 1940’s and 1950’s (for example, Trotsky 1974, Veblen 1963), and iii) the knowledge-class theories of the 1970’s (for example Gouldner 1979, Bell 1979). The new ‘knowledge-class’ theories are of particular relevance here, as they are used to explain support for new political movements and concerns. Knowledge class theorists

typically argue that a new type of knowledge (call it adversary culture, teleological knowledge, cultural capital etc.) is gaining ground and the possessors of this knowledge are in a radically new relationship to domination. It is assumed that the possessors of this new type of knowledge can now make an autonomous bid for power (Szelenyi and Martin 1988:657).

Szelenyi and Martin (1988:656) also claim that Gouldner’s account offers the most comprehensive version of the new knowledge-class theories. Eckersley (1989) and Pakulski (1993a:140) similarly identify Gouldner (1979) as the forerunner of the ‘new class’ accounts of ‘Western eco-pax movements’. Because of this recognised centrality, I commence the discussion of new class accounts with a brief summary of Gouldner’s (1979) neo-Marxist theory. The explanations advanced by Eckersley (1989), Inglehart (1981, 1990a), and Ehrenreich and Ehrenreich (1977, 1979) are then critically reviewed.

For Gouldner (1979: 21), the new class is a “new cultural bourgeoisie whose capital is not its money but its control over valuable cultures”. The higher education system plays a central role in the emergence of the new class, as it provides “the institutional basis for the *mass* production of the New Class of intelligentsia and intellectuals” (1979:3). The higher education system through “the expansion of primary and secondary public school teachers greatly increases the jobs available to the New Class” (1979:3). According to Gouldner (1979:8), the new class does not own the means of production, although “there



are certain communalities in the New Class's relationship to the means of production and, in particular, to what I...call cultural capital or human capital".

Gouldner's new class comprises both humanistic intellectuals and technical intelligentsia, among whom professionalism is the "central occupational ideology" (1979:42). The new class is unified by a culture of critical discourse (CCD). The CCD unifies class members "in much the same way as ordinary languages, say French or German", in that it forms the "*common bond between humanistic intellectuals and technical intelligentsia*" (1979:30).<sup>12</sup> Macy (1988:328), explains that the CCD emphasises "reasoned argument, intellectual scepticism, and a critical orientation toward traditional social and economic arrangements". Szelenyi and Martin (1988:656) note that the culture of critical discourse

captures the common feature, the common quality of knowledge shared by Marxist radicals, professionals, the technical intelligentsia, and adversary or counter-cultural intellectuals. As the knowledge of the highly-educated takes the form of a Culture of Critical Discourse, the cultural capital thus acquired, enables them to "usurp" from the position of power both "old line bureaucrats" of state socialism and private capitalists, owners of money capital.

Gouldner (1979) endows the new class with anti-bourgeois radicalism and universal emancipatory potential. He suggests that "it is the most progressive force in modern society and is the centre of whatever human emancipation is possible in the foreseeable future" (1979:83). Moreover, the new class is important because its members possess "scientific knowledge and technical skills on which the future of modern forces of production depend" (1979:83). Of particular relevance for this research, members of the new class often support and take leading roles in new social movements such as the environment movement.

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<sup>12</sup> "The culture of critical discourse (CCD) is an historically evolved set of rules, a grammar of discourse, which (1) is concerned to *justify* its assertions, but (2) whose *mode* of justification does not proceed by invoking authorities, and (3) prefers to elicit the *voluntary* consent of those addressed solely on the basis of arguments adduced" (Gouldner 1979:28).

The new ecological ideology signifies that the older instrumental ideology of the New Class is giving way to one with keener concern for the goals of action and which refuses to surrender these to others and to limit itself to specifying the means of action (Gouldner 1979:42).

More recent new class accounts such as that advanced in Australia by Robin Eckersley explore this link between environmentalism and class in more detail. Eckersley (1989:205) presents an explanation of the composition of the green movement “which focuses on the education of the new class and its relative structural autonomy from the production process”. In doing so, she rejects the “class interest argument” that “green politics is a means of furthering either middle-class or new-class interests”. She also rejects Inglehart’s (1981) new class account, which suggests that the “development of the green movement is the result of the spread of postmaterial values, the main bearers of which are the new class” (Eckersley 1989:205).

Eckersley (1989:221) emphasises the importance of advances in technological areas (nuclear, genetic, chemical), international communications (computers and television), and the growth in higher education. She suggests that such increases in the flow of information help “to shift social perceptions of old issues”, a result of which is increased support for environmental issues (1989:221). The impetus for such support is found largely among the new class “conceived as an adversary culture in Gouldner’s sense), by virtue of its high education and relative autonomy from the production process”. The new class comprises both technical intelligentsia and humanistic intellectuals, but it is the latter group that have greater autonomy from production processes, and a “relatively greater degree of alienation from the centres of wealth and power” (1989:222). The humanistic intellectuals are therefore more likely to become actively involved in new social movements.<sup>13</sup>

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<sup>13</sup> Eckersley (1989:209) suggests a “further significant characteristic of adherents to the CCD is that they conceive of themselves as responsible for and representative of a society as a whole, an attitude that Gouldner notes as being particularly prominent among teachers and academics”.

Their relative independence from the vagaries of the market sector explains why the new class (especially public sector employees) are more inclined than the working class to be critical of the industrial system and actively involved in seeking reform (1989:222).

However, it seems odd that the new class as state sector beneficiaries should, as Eckersley (1989:222) puts it, seek to “bite the hand that feeds them” in fighting for reforms that would lead to a diminished public sector. Nor does the adoption of a critical stance toward the industrial system necessary translate into socio-political activism by these professional groups.

The neo-Marxists Barbara and John Ehrenreich (1977, 1979) identify the new class as professional-managerial workers (PMC). The PMC, they suggest, “is not part of some broader middle class, which includes both “old” and “new” strata, but rather is a distinct class, separate from the old middle class” (1977:11). As such the PMC is an entirely new class. The Ehrenreichs employ a fairly standard Marxian definition of class, suggesting that it is “characterised by a common relation to the economic foundations of society - the means of production and the socially organised patterns of distribution and consumption” (1977:12). Class members share not only interests, but also “a common lifestyle, educational background, kinship networks, consumption patterns work habits, beliefs” (1977:12). The Ehrenreichs (1977:17) maintain that this new class of “professional-managerial workers exist, as a mass grouping in monopoly capitalist society, only by virtue of the expropriation of the skills and culture once indigenous to the working class”.

The Ehrenreichs’ account is not without its problems. Their definition of the PMC as a class consisting of “salaried mental workers who do not own the means of production and whose major function in the social division of labor may be described broadly as the reproduction of capitalist culture and capitalist class relations” (1977:13), poses a question of heterogeneity and unity. Indeed, the Ehrenreichs acknowledge that the PMC is divided into two groups. The first group consists of those employed by social control agencies, or concerned with

“the production and propagation of ideology” (Ehrenreich and Ehrenreich 1979:12). As Marks et al (1989:412) point out, the first group is comprised of “teachers, social workers, doctors, police, members of the armed forces and artists. The second group, whose functions are generally concerned with reproducing capitalist relations of production, includes managers, administrators, engineers and other technical workers”.

Cast from the Marxian mould, the Ehrenreichs’ PMC schema also includes a notion of objective antagonism. In fact, as the PMC is “antagonistic to both capital and organised labour” there are two class conflicts and two classes opposing it (Waters 1989:9). Both the PMC and the working class “confront the capitalist class over the issue of ownership and control of the means of production. They confront each other over the issues of knowledge, skills, culture” (Ehrenreich and Ehrenreich 1979:45). The class consciousness of the PMC is expressed as “scorn for the capitalist class and elitism toward the working class” (1979:31). The elements of this class consciousness are detectable, according to the Ehrenreichs in the attitudes of new social movements supporters.

In fact the PMC are strong supporters of new social movements. The Ehrenreichs (1979:33) maintain that the class interests of the PMC are expressed “in the New Left, the anti-war movement, the ecology movement, the women’s liberation movement - all of which defied “the system” but often with moralistic contempt for the working class”. However, the Ehrenreichs’ new class account is also problematic. There is no clear link between occupational location and alleged class interests. They also fail to clearly delineate classes, and as the PMC is internally divided into two sub-classes, its unity is questionable. Finally, the link with new social movements is vague, and ignores the possibility that elements of the PMC, particularly the ‘managerial’ component are more likely to be anti-green.

Better known for his work on value change, Inglehart (1981, 1990a) also makes reference to the 'new class' as a support base of new politics. Yet while he makes reference to the new class, he does not explicitly define it, claiming there "is no clear consensus on the criteria that define the new class" (1990a:331). Nevertheless he has no hesitation in stating "this group is distinctive not only in its occupational and educational characteristics, but also in its values" (1990a:332). Inglehart (1990a:332) maintains that "the rise of Postmaterialism and its subsequent penetration of technocratic and professional elites has been a major factor behind the emergence of the new class" claiming that "the ideology attributed to the new class reflects Postmaterialist values rather closely".

Like Offe (1985), Inglehart does not claim that the new class acts out of class interests - it has no socioeconomic basis. However, he does attempt to locate the new class in sociohistorical processes. In particular, he links the ideology of the new class with postmaterialist value orientations, and suggests that the "distinctive values of the new class reflect an historical change that can not be attributed simply to a changing educational and occupational structure" (Inglehart 1981:895). To confuse matters further, Inglehart (1981, 1990a) links the new class with generational location, which is closely associated with his value change thesis.<sup>14</sup> Thus, in his usage, new class becomes a vague (and confusing) descriptive label. It bears little relation to class theory of any consistent type. With his particular focus on values and ideology, Inglehart seems to ignore socioeconomic linkages. This point is not lost on Eckersley (1989:216), who maintains that Inglehart "appears to be defining the new class...in terms of its ideology or adversary culture, rather than as a socioeconomic stratum". In fact, he uses it as a 'rubbery' term that describes an historico-cultural grouping.

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<sup>14</sup> See Chapter 3.

### ***‘Statist’ classes***

What is referred to here as the ‘statist class’ forms a sub-stream of new class theory. Seemingly inspired by Dahrendorf (1959, 1988), authors such as Mattausch (1989) and Kriesi (1989) suggest the formation of new classes based upon *public sector employment*. The new class members are supportive of new social movements, including the ‘eco-pax’ movements. McAdams (1987), and conservative authors such as Moynihan (1972), Ladd (1978) and Kristol (1972, 1975, 1978) also advocate ‘statist’ new class theorists. Although differing considerably on ideological grounds, Mattausch, McAdams and the three neo-conservatives all give primacy to the public sector as the occupational basis and key defining characteristic of the new class.

According to Mattausch (1989), Campaign for Nuclear Disarmament (CND) participants are members of a new class comprised of ‘welfare state occupations’. He claims that such new class occupations include doctors, nurses, social workers, lecturers and teachers whose “views and opinions had been fostered or engendered by their experiences of higher education, postgraduate professional training (for example, social work or teacher training courses), and their welfare state employment” (1989:221). Through what he terms a ‘state apprenticeship’, or form of career socialisation, CND participants “naturally absorb the ethic of the welfare state, a specific sociopolitical orientation which finds expression in, and acts as a resource for, nuclear disarmament campaigning” (1989:221).

Mattausch rejects Parkin’s notion of middle class radicalism, which suggests that CND supporters opt for welfare and creative occupations because of family socialisation experiences prior to working. Instead, he argues that career training results in attitudes favourable to supporting new social movements. He suggests that rather than “ ‘middle class radicalism’, CND

campaigning can be more profitably seen as 'state class radicalism' ”  
(1989:221).

Kriesi (1989) finds that new social movements in the Netherlands are supported by a new class. He locates the 'new class' within the 'new middle class' (1989:1080-1081). Kriesi (1989:1081) focuses upon divisions within the new middle class because “the new class is generally thought to be part of the new middle class and because it is here that we expect the mobilisation potential of the NSM's to have its structural roots”. He subdivides the middle class into five categories.<sup>15</sup> Among these categories, Kriesi suggests it is only the 'social and cultural specialists' that constitute the 'new class'. The new class therefore includes professionals and semi-professionals who are employed in “medical services, teaching, social work, arts and journalism, and other social and cultural specialists” (1989:1082).

In a manner similar to Gouldner, Kriesi differentiates between 'technocrats' and 'specialists' (intellectuals). He argues that “it is the specialists who form the new class, and it is the antagonism between technocrats and specialists that constitutes the structural basis for its formation” (1989:1082-83). New social movements, according to Kriesi (1989:1083), are “one of the arenas of confrontation between these two camps in the new middle class and the political struggles of the NSM's can be thought of as contributing to the formation of the new class”.<sup>16</sup>

Yet as Pakulski (1995:64) points out, if “the 'new class' is the product of increasing state power and growing state intervention ('state class'), its interests

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<sup>15</sup> Kriesi (1989:1080) follows Wright (1985) in basing his class divisions upon “effective control over productive assets”, which include “assets in the means of production, organisational assets, and skill/credential assets”. Kriesi's class schema has 12 classes, comprised of the Bourgeoisie/old middle class of i) farmers, ii) large employers, iii) petit bourgeois, iv) traditional professions; the 'New Middle Class' of v) social and cultural specialists, vi) administrative and commercial personnel, vii) technical specialists, viii) craft specialists, ix) protective services; and the Working class of x) lower-level employees, xii) skilled workers, and xii) unskilled workers.

<sup>16</sup> As an element of the new middle class, the 'specialists' are in conflict with another element, the 'technocrats'. Through the ensuing 'political struggles' played out on the battle ground of new social movements, these 'specialists' are transformed into a new class. However, this is not a new class at all, but merely part of the 'new middle class' (itself a contested notion) that has been renamed.

and its styles of political action should be pro-statist, that is, supportive of the state and state interventions. In fact, many aspects of new movements are distinctly anti-statist”.

In a somewhat similar vein, although exhibiting a strong neo-Marxist influence, McAdams (1987:23) suggests that the “post-industrial economic order gives rise to an elite which has a class interest in the expansion of government: the New Class”.<sup>17</sup> Employing cluster analysis and utilising national survey data, McAdams claims to have identified three distinct class world views, which he attributes to the traditional middle, the traditional working class, and the new class. He employs the Marxian concepts of socioeconomic base and class ideology in his analysis, as his assumptions are based on the notion that “ideas come, not individually, but in *socially determined packages*”(1987:29).

McAdams (1987:23) suggests that the new class may be identified by their “liberal policy preferences, and through a pattern of group identifications which distinguish it clearly from other traditional middle and working classes”. For him the new class has “a comparative advantage in politics, as opposed to the market” (1987:24). It does not consist merely of experts, ‘knowledge industry’ workers or symbol manipulators, but rather of “one wing of the ‘knowledge elite’, that wing whose objective class interests are served by the expansion of government” (1987:25). Thus McAdams’ (1987:27) new class is “based in the professions, in higher education, and in the state sector”. New social movements, such as the environment movement, are based upon the new class. He notes that if conceptualised as new class movements,

the rise of elite liberal and leftist political movements (consumerist, environmentalist, and “public interest”) becomes explicable. People in such groups need not be viewed as moved by idiosyncratic and inexplicable factors, nor by a socially detached “enlightenment”, but

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<sup>17</sup> It is interesting to note that McAdams seems intent on further muddying the water, by attributing ‘class’ interests to an ‘elite’ group. This conceptual sloppiness occurs on a number of occasions, as for example, when he suggests that “an additional class, an elite produced by advanced economic development, has become an important force” (1987:24).



rather as part of a social class with a particular world view and a particular relationship to the economy (1987:45).

Such views attract some criticism. Rootes (1995:229) among others, points out that McAdams fails to consider “the *values* inculcated in the professions and developed by higher education, and the possibility that it is the values of professionals and the higher educated that are directly expressed in their attitudes and behaviour rather than that their attitudes and behaviour are the reflection of class interests”. There are also problems with delineation between classes, and with a conflation of the economic and political foundations of the allegedly new class.

A number of American neo-conservative writers identify a class that they see as threatening the democratic stability of advanced Western societies. Although extremely vague about the characteristics of new class members, Moynihan (1972:83) suggests that “social legislation of the middle third of the century created ‘social space’ for a new class whose privilege (or obligation) it is to dispense services to populations that are in various ways wards of the state”. Moynihan is principally concerned with the increasing power of the public sector - specifically the increases in ‘welfare state’ practices and the corresponding decline in the influence of the free market due to increasing regulation.

In common with Eckersley (1989), Ladd (1978:53) suggests that education has replaced occupation as “*the key factor in determining today’s class divisions*” (italics in original B.T.). He notes (in a manner similar to Inglehart) that the highly educated espouse qualitatively different attitudes on social issues, as

the college trained, when compared to the high school and grade school educated, urge less emphasis on money, more on “self fulfilment”, less on (making) “sacrifices for (one’s) children, and the like (1978:52).

Ladd (1978:51) views the ‘intelligentsia’ or ‘new bourgeoisie’, as he variously refers to the new class, as consisting of “college educated

professionals". This highly educated new class supports "environmental protection and reduced energy consumption, even at the expense of unemployment and inflation", and adopt the "more critical outlook of society which characterise the intellectual community" (Ladd 1978:52,53).

Kristol (1975:135) argues that the new class emerged due to increases in mass higher education following the Second World War. He suggests it adopts the guise of "Reformist-liberal rhetoric" under which "more explicitly socialist and neo-socialist themes are beginning boldly to emerge".<sup>18</sup> Kristol (1972:43) claims that the "professional classes of our modern bureaucratised societies are engaged in a class struggle with the business community for status and power". The new class therefore seeks radical economic and social change, including radical increases in environmental protection.

Though they continue to speak the language of 'progressive reform', in actuality they are acting upon a hidden agenda: to propel the nation from that modified version of capitalism we call 'the welfare state' toward an economic system so stringently regulated in detail as to fulfil many of the traditional anti-capitalist aspirations of the Left (Kristol 1978:15).

In a similar vein to the conservatives, Szelenyi and Martin (1988:662) argue that as "the West is sliding-with some cyclical fluctuation-toward a statist future, away from competitive capitalism, the likelihood of a statist New Class domination is increasing". They suggest that "All new class theorists claim that post-capitalist society will be a new class society in which a new class, other than the proletariat, will rule. But beyond these two points there may be no common ground for New Class theorists" (1988:647).

However, there are some problems with these arguments. Firstly, there is no consensus among new class theorists on the emancipatory potential of the new class. While some such as Gouldner (1979) see the possibility for emancipation through the new class, for other theorists, emancipation is not the

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<sup>18</sup> Kristol (1975:134) suggests the new class consists of "scientists, lawyers, city planners, social workers, educators, criminologists, sociologists, public health doctors". In a later work he also adds "educational administrators, journalists and others in the communication industries" (1978:27).

key issue. Many theorists employ notions of new class to explain increases in new political attitudes, preferences, and forms of participation (for example, Parkin 1968, Dalton 1988, Eckersley 1989).

Secondly, Szelenyi and Martin are mistaken in stating that new class theorists have little in common. While the specific definitions and ideological underpinnings of new class accounts vary widely, as noted by Brint (1984) and Phelan and Phelan (1991), in other ways new class accounts are very similar. Almost all new class theorists agree that the new class comprises tertiary educated categories. Most suggest that it includes professional occupations, while many also claim that new class members are predominantly employed in the public sector. The degree of definitional overlap among new class theorists is quite high. The new class approaches differ in the emphasis placed upon one or other of the three main defining characteristics of new class - education, occupation and employment sector. It is this variation in emphasis that results in broader or more narrow versions of the new class. The degree of variation depends on the definition of professionals (broad for McAdams 1987, as opposed to narrow for Kriesi 1989), and/or on whether all white collar workers regardless of employment sector are included (Dalton 1988), or only public sector workers (Mattausch 1989). On the third characteristic of new class - high education - there is the most agreement.

### **Criticism of the new class**

I have already signalled some problems with the new class interpretations and explanations of environmental new politics. In this section these problems are discussed in a more systematic way and in the context of the most cogent critical responses to new class theorising.

### *Problems with class interests*

A number of authors argue that the new class acts out of sectional interests. For example, McAdams (1987) maintains that the interests of the new class lies in the expansion of the state or public sector. Burklin (1983) argues along similar lines. As Lowe and Rudig (1986:522) explain, Burklin links the “ecological inclinations” of the new class “with their objective self-interest in the maintenance and extension of the welfare and regulatory states”. Ward (1983:190) also notes that as “the state sector would almost certainly expand with any environmental cleanup, one can see quite good reasons why public sector workers should support environmentalism”.

Sectional interests at the level of occupations are also attributed to supporters of environmental social movements. Gerritson (1990:56) for example, maintains that those whose employment has links to the ecology movement (for example zoologists, ecologists, environmental scientists, geographers) stand to directly benefit from increased preservation of wilderness areas. He claims that “National Parks create managerial employment for, amongst others, people with scientific training in the broad area of ecological studies. So some occupations (and tertiary teachers and researchers in the relevant disciplines) are advantaged by increased wilderness preservation” (Gerritson 1990:53). Others, such as Frankel (1987), have little faith in the commitment of the new class to new political causes if this involves a threat to their personal livelihood. He suggests that new social movement supporters have concentrated their protests against “capitalist enterprises and state apparatuses...which do not necessarily threaten jobs in the ‘social wage’ services of local and national state sectors” (1987:239-40). Frankel (1987:239-240) stresses that he is not suggesting

all ‘new class’ activists in social movements are self-interested protesters who campaign only on issues that allow them to maintain their comfortable lifestyles. But when post-industrial theorists hail

the new agents of social change, it is important not to have illusions about how far these professionals are prepared to struggle”.

Yet as signalled above, it is problematic to link environmental protest activities with new class or occupational interests. As Lowe and Rudig (1986:522) point out, there are

problems in identifying the pro-environmental actions of the new class with its own well-understood interest. The demands of radical political ecology for fundamental changes in industrial society do not accord with this model. The financing of the welfare state is dependent on continued economic growth - why should it be in the interests of those who work within it to demand the end of economic growth and a halt to major technological projects?

Nor does the over representation of certain occupations among environmental movements imply that these movements are driven by class interests. It is timely to recall Offe's (1985) contention that the supporters of new politics may be (new) middle class in origin, but their interests are not class interests. Although certain occupations may be over represented among environmental groups, the occupational constituency of new social movements is diverse. NSM's encompass a wide range of occupational groups, and also include students, the unemployed and retired (Offe 1985).

Rootes (1995) also rejects the idea that class or sectional interests propel the new social movements. He claims it is “doubtful that their more general social and political attitudes or their involvement in new social movements can be attributed to sectional self-interest, much less to class interest” (1995:230). Clark et al (1993:311) note that “even in rallying to a socially liberal agenda, new class members do not act as a self-conscious, united class but usually as voters and members of ‘single-issue’ groups”. Pakulski and Waters (1994:12) go further to argue that “New movements mobilise non-class constituencies and publicise non-class issues. The relevance of class schemes for the analysis of composition and orientations of such movements, especially Western ones, is

very low". Finally, the class interest criticisms of Hindess (1987) are most relevant here. He argues that

in so far as interests have an explanatory role, they are always dependent on definite discursive and other kinds of conditions, and their identification is always open to dispute. Interests are not fixed or given properties of individuals or groups, and they should not be regarded as structurally determined. The claim that class as a social force can be understood in terms of the representation of class interests must therefore collapse (Hindess 1987:112).

There may be another reason that many theorists see new social movements as 'new class' movements. New social movement participants employed in 'new class' occupations tend to come to the fore as influential players in social movement organisations, and have a disproportionate influence over agenda setting.<sup>19</sup> These key activists or 'leaders' also tend to be media spokespeople. As they present the movements' public image, an impression arises that new social movements are comprised of new class participants.

Yet even if these so called 'new class' activists do effectively control the direction of new social movements, they are still not class movements. It may be more useful to explain new social movements as having a form of 'elite' control, where a small number of influential activists to a large extent set the agenda for the 'mass' of rank and file participants (Tranter 1995):

### *Problems with composition and theoretical linkages*

There is some disagreement over the composition of the new class, and also as to whether it constitutes a real class, in the sense of generating interests, consciousness and solidarity (see Bruce-Briggs 1979).<sup>20</sup> It is suggested by some authors that the new class is not in fact a class at all, but merely a conglomeration of occupational categories. Macy (1988:327) for example,

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<sup>19</sup> They are typically better educated, more articulate, and as professionals have greater occupational autonomy, which allows them to spend more time on extra-occupational activities.

<sup>20</sup> Although as mentioned above the differences in the composition of the new class are more a matter of the degree of emphasis placed upon the defining characteristics of the new class - professional occupational location, employment sector, and level of education.

claims that “social-cultural specialists are not a structurally defined class, but an “aggregation” of occupations with no broadly unifying collective life or organisational affiliation”. Bell (1979:22) is equally critical, arguing that “if there is any meaning to the idea of a ‘new class’...it cannot be located in socio-structural terms, it must be found in cultural attitudes. It is a mentality, not a class”. If there are disagreements over the ‘classness’ of the new class, then it is difficult to attribute sectional interests to such a ‘blurred’ category.

Some also claim that structural explanations have rather limited application to new political issues and activism. For example, Clark et al (1993) argue that such explanations “cannot specifically account for activism on problems such as environmental devastation...to account for these trends, it is likely to be a more promising strategy not to stretch class analysis farther but to recognise that structural cleavage based explanations must be supplemented by others: that the new may indeed be quite new” (Clark et al 1993:313). Pakulski and Waters (1996) point out that the notion of the new class is theoretically flawed.

New-class theories reverse the logic of class analysis. While class analysis explores the political articulation of the economic class structure, new-class theories see classes as sociocultural and sociopolitical categories. They locate the origins of class in education, political organisation, industrial-sectoral location, symbolic skills and cognitive capacities. The problem is not the argument that sociocultural factors can generate social groupings, but that such processes can be interpreted in class terms rather than in terms of say, elites or status. This undermines the identity and integrity of class theory, blurs the distinctions between class and non-class formations, and increases the conceptual stretch (Pakulski and Waters 1996:59).

The utility of class interpretations, especially when applied to environmental new politics is questionable. As Rootes (1995:231) notes, “class is all very well in its place, but...its place in the analysis of the new politics and the new social movements is really very limited”.

### ***Problems with empirical 'testability'***

While there are a plethora of new class accounts, few theorists appear to have the inclination to 'test' their theories in an empirical sense. Possibly this reluctance is heightened by the fact that when such attempts are made, the results rarely support the theoretical claims. At best attempts to operationalise and 'test' new class accounts return somewhat ambiguous findings.

Empirical evaluation of new class theories are also hampered by (deliberately?) vague definitions of new class. Class boundaries are seldom clearly delineated (for example Inglehart 1990a, Dalton 1988, Ehrenreich and Ehrenreich 1979). In most instances, therefore, the new class(es) are difficult to operationalise in a manner consistent with the original theoretical account. Nevertheless, *some* empirical evidence suggests a link between new politics and new class.

Studying the political scenario in Germany in the 1980's, Baker et al (1981:157) found that "New politics orientations are strongest among the new middle classes, reflecting the affluence of their middle-class upbringing and the later-life influence of occupational role". Kriesi (1989) also found support among "social and cultural specialists" in Dutch new social movements, although this support was limited to the core activists.<sup>21</sup>

On the other hand, Rohrschneider (1990) found no empirical evidence to suggest that the new middle class supports environmental groups in Western Europe to a greater extent than other classes.<sup>22</sup> Further, Inglehart and Rabier (1986) found little empirical support for the relationship between class and new politics in Western Europe. In fact they concluded "Despite its central role in

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<sup>21</sup> He claims that "[I]f we compare the class composition of the outer circles of the different movements with that of the general population, we note that these outer circles resemble the composition of the Dutch population quite closely" (Kriesi 1989:1101).

<sup>22</sup> Rohrschneider (1990:25) was surprised to find "that membership in the new middle class is largely unrelated to public support for environmental groups. Given the strength of the arguments made in support of this explanation, the empirical evidence is weak".



social theory, social class today has become an astonishingly weak empirical predictor not only of electoral behaviour, but of ideology as well” (1986:473).

Part of the problem is that the new class is operationalised in many different ways. Sometimes it is seen as a very general social category and on other occasions as a much more narrow, exclusive occupational category. For example, Eder (1993) views the new middle class as a broad white collar and petit bourgeois category; Baker et al (1981:171), Dalton (1988:154) and Rohrschneider (1990:9) define the new middle class as “civil servants” and “salaried white collar workers”; while at the other end of the spectrum, Kriesi (1989:1081) defines the new class as ‘social and cultural specialists’. Finally, Brint (1984:30) is most specific and includes “specialists in social science and arts-related occupations” in the new class. These different delineations lead to inconclusive and often incomparable findings.

Yet even though there are a number of problems with new class accounts, they remain popular in political sociology. Perhaps this is due to a reluctance on the part of many social theorists to abandon the established class paradigm completely. Possibly this reluctance is exacerbated by the problematic nature of new and alternative explanations to class. Some theorists may also persist in using class accounts due to ideological allegiances, or because ‘class’ is thought to be a widely understood and familiar concept, even though it is not now used with any consistency of meaning. Whatever the reasons for their persistence, class accounts are likely to continue to be employed in political sociology, in spite of the growing empirical evidence that suggests new class support for new social movements in Europe and the USA, is, to say the least, problematic. While there is some empirical research on the relationship between class and environmental new politics in Australia, it tends to focus on green voting and does not engage the broad range of new class accounts produced in recent years. I attempt to fill this gap by empirically evaluating new class support for environmentalism in Chapters 5-7.

## Chapter 3

### Generations and Environmentalism

Some theorists suggest that support for environmental new politics is linked with specific generations or age groups. Because of their sophistication and recent revival in popularity, generational accounts are particularly important in this respect. Karl Mannheim's (1972) classic account of the generational origins of *Weltenshauungen* provides a theoretical foundation to generational accounts, while Inglehart's (1990a) influential theory of postmaterialist value change, although lacking specific reference to Mannheim's work, forms a basis for contemporary generational accounts. Both are discussed here in detail.

I also discuss accounts that interpret environmental support in terms of age groups and categories. The research literature on environmentalism indicates that environmental concerns and support for environmental groups is strongest among younger people (for example see Van Liere and Dunlap 1980, Watts and Wandesforde-Smith 1981, Inglehart 1990b, Eyerman and Jamison 1991, Abramson and Inglehart 1992, 1994). A correlate of support for environmentalism - involvement in 'radical' political activities such as protests and demonstrations - is also stronger among the young (Bean 1991:265). Two main explanations of these regularities are advanced: the 'life cycle' and the 'generation' hypotheses. McAllister (1992:86) explains that the "political senescence (or *life cycle*) explanation suggests that as people grow older and become less flexible in their thinking, they become more conservative in their opinions". Some claim that younger people are more likely to support environmentalism because they are less well integrated into the 'dominant social order' (Van Liere and Dunlap 1980). In a variant of the life cycle explanation, it is argued that as "solutions to environmental problems are often viewed as threatening to the existing social order, possibly requiring substantial changes in traditional values, habitual behaviours, and existing institutions...it is logical to expect youth to

support environmental reform and accept pro-environmental ideologies more readily than their elders” (Van Liere and Dunlap 1980:183, citing Malkis and Grasmick 1977, and Hornback 1974). Milbrath (1984:75), suggests a number of ‘life cycle’ related reasons why older people are less supportive of the environment:

Simple self-interest helps to explain some of this relationship: undertaking several years of effort to clean up the environment can hardly be as important to someone who expects to live only another eight or ten years as it is to a person who is looking forward to sixty or more years of continued life. Additionally, vigorous physical contact with the natural environment, such as hiking, is likely to be much more attractive to a young person than an older person. Furthermore, environmental topics are likely to have been part of the curriculum for persons passing through the schools in the past ten years whereas those topics were largely unknown to people who went to school forty or fifty years ago.

Parkin (1968) advances an account of support for new political phenomena based upon early socialisation. He suggests that family socialisation may provide “an alternative mode of explanation to the generation concept in that its major postulate declares that political attitudes and loyalties are formed at a relatively early age, through childhood exposure to parental influences, direct and indirect. These influences...have a decisive effect on the individual’s political outlook throughout his life” (Parkin 1968:145). Following this line of reasoning, younger people may be more likely to support new political phenomena such as environmental movements due to their ‘radical’ family backgrounds.

It must be stressed that age/life cycle accounts are quite different from generational accounts. The latter focus on generationally structured predispositions, orientations, and values, that reflect *shared formative experiences*. People who share formative experiences may tend to respond similarly on political issues, such as environmentalism. The tendency for members of certain generations to be more sensitive to environmental issues and appeals are linked with specific formative events, such as wars and economic depressions that affect a large number of people in

a similar manner. Thus it is not age, or position in the life cycle, but belonging to a certain generation that is seen as the key explanatory factor.

Of course the value of generational accounts depends upon the strength of such formative experiences, and the clarity of generational watersheds. The extent to which societies are generationally (that is socio-historically) structured differs, and the temporal boundaries between generations may vary widely. Generational boundaries differ between societies, even between neighbouring countries. For example, Pakulski (1991) points out that the generational divisions in Germany, Poland and the former Czechoslovakia are drawn quite differently. Australian society appears to share generational divisions with major developed Western nations, despite its Asian geography. The key generation-shaping events in Australia were the 'Great Depression', the Second World War (WWII), the post WWII 'long boom', and possibly the 'post-boom' period beginning with the oil crisis in the early 1970's.<sup>1</sup>

Generational accounts state that people who share certain formative experiences tend to develop similar attitudes and behaviour. Jennings and Niemi (1981:331) claim that in a broad sense, 'generation' refers to an age group that shares the same temporal and social location. They argue that such groups "have an identity in terms of their historical-social location and thus have the *potential* of participating in a common destiny. But this is simply a potentiality brought about by the accident of biological and geographical commonality" (1981:331). But as Jennings and Niemi also stress, belonging to a generation only implies the *potential* for the emergence of a group capable of initiating social change. Generation members may have little in common unless they develop similar orientations.

With specific relevance to environmentalism, Van Liere and Dunlap (1980) note the development of an 'ecology-minded generation' which has experienced exposure to environmental information via the mass media, and through educational institutions.

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<sup>1</sup> However, it is important to note that events such as WWII and the post war boom period may have had a diminished impact upon Australia compared to West European countries. For example, Australia did not have to fight on home soil. Consequently, the post war reconstruction period and associated 'boom' was not as marked as in Western Europe. Therefore, generational differences in Australia may be less noticeable.

They stress the enduring nature of generational effects, and note that this generation's "commitment to environmental reform should not disappear as they move into adulthood" (Van Liere and Dunlap 1980:183). Alternatively, Gerritson (1990:5) argues that "the green movement could falter as the post-materialist "baby boom" generation ages and its direct consumption of wilderness inevitably declines".

### *Mannheim on generations and politics*

Mannheim (1972:276-320) developed the notion of 'generation' as a key socio-historical and socio-structural concept that could be used to explain aspects of politics and ideology.<sup>2</sup> 'Generation' emerged as a sociological attempt to address the argument from historicism. As Kecskemeti (1972:22) suggests in his introduction to Mannheim's work,

According to historicism, the most important thing about the works of the human mind is that they can be 'dated': we cannot understand them except by relating them to the period in which they originated. If we refine this analysis, we shall be faced with the problem of the generation as an historic unit. For it is not only possible to 'date' a certain work as belonging to a certain period; within one and the same period, one can distinguish the works of the older generations from those of the younger. Here, then, we see concrete groups which in a way determine styles of thought and action; and yet, it cannot be said that it is 'interests' or 'common socio-political aspirations' that give the members of the same generation a common orientation.

Mannheim's reformulation of generation occurred in the context of his sociology of knowledge - notably as a development of the idea that something "other than 'sociological' factors...seem to be responsible for certain characteristic modifications of thought" (Kecskemeti 1972:22). Generations originate not as concrete social groups but as socio-historical categories. For Mannheim (1972:289), 'concrete social groups' form through "the union of a number of individuals through naturally

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<sup>2</sup> Pakulski (1991:71) suggests that 'generation' as employed by Mannheim is sociologically useful "because it links certain age-group characteristics, socialisation processes, and sociohistorical transformations. When used in this sense, 'generation' becomes a structurally rooted concept".

developed or consciously willed ties”.<sup>3</sup> Such socially articulated generations share a similar location in the social structure; “the unity of generations is constituted essentially by a similarity of location of a number of individuals within a social whole” (Mannheim 1972:290) .

Mannheim makes a number of conceptual distinctions relating to generations. He distinguishes between generational locations, generations as ‘social actualities’, and generation units. In relation to generation as a location, he suggests that “Any given location...excludes a large number of possible modes of thought, experience, feeling and action, and restricts the range of self-expression open to the individual to certain circumscribed possibilities” (1972:291). Generations as social actualities imply more than simply shared location. Such generations involve, as Mannheim (1972:303) puts it, “a further concrete nexus” which “may be described as *participation in the common destiny* of this historical and social unit.”

We shall therefore speak of a generation as an actuality only where a concrete bond is created between members of a generation by their being exposed to the social and intellectual symptoms of a process of dynamic de-stabilisation (Mannheim 1972:303).

Individuals only comprise an actual generation when they are united, when they participate in the “social and intellectual currents of their society and period”, and have “an active or passive experience of the interaction of forces” comprising the new situation (1972:304). Whereas generation as location “means the same as the broadest sense of the term - to coexist or be located with others of the same age”, generation as actuality “shares a community of experience and feeling” (O’Donnell 1985:2).

The third concept developed by Mannheim is the ‘generation unit’, which represents a far more concrete social entity. Generation units “do not merely involve a loose participation by a number of individuals in a pattern of events shared by all alike...but an identity of responses, a certain affinity in the way in which all move with and are formed by their common experiences” (1972:306). He also notes that at

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<sup>3</sup> Examples of concrete groups are the family, tribes, and sects. Following Tonnies, Mannheim (1952:288) further distinguishes between community groups based on spatial proximity , and association groups based upon “the conscious application of the rational will”.

any one point in time, a number of “differentiated, antagonistic” generation units may exist that as a whole form “an ‘actual’ generation” (1972:306).<sup>4</sup>

It is difficult to overlook in Mannheim’s distinction the analogy to Marx’s ‘class in itself’ and ‘class for itself’, and Weber’s distinction between ‘class situation’, class category and class community. However, the way in which these generational concepts are deployed remains highly original. As O’Donnell (1985:2) explains, Mannheim “introduced the concept of generation unit to provide more specific analysis. Generational units share an identity of responses and views about events. Thus there were various pro- and anti-war units within the ‘Vietnam War generation’”. Mannheim’s notion of generations enriched the sociology of knowledge. He developed a conceptual framework where *Weltanschauungen* - global outlooks or world views - specific to certain cultures may be explained by linking them with socio-historical processes.

### *Generations, value orientations and political change*

Although Inglehart (1981, 1990a) appears in Chapter 2 as a ‘new class’ theorist, he is better known for his work on value change and *generational* replacement. He is undoubtedly the most influential contemporary social theorist using the concept of generation to explain political outlooks and behaviour.<sup>5</sup> Inglehart (1990b:43) argues that the key to understanding political preferences and behaviour lies in childhood socialisation, as one’s early experiences influence the formation of different value priorities.<sup>6</sup> People growing up in times of relative economic affluence and physical safety are more likely to develop postmaterialist values, and tend to favour quality of life issues over economic - materialist issues. Those experiencing economic hardship, wars, or political upheavals, are more likely to develop materialist value priorities in

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<sup>4</sup> As an example Mannheim (1972:307) suggests that “Those who were young about 1810 in Germany constituted one actual generation whether they adhered to the then current version of liberal or conservative ideas. But in so far as they were liberal or conservative, they belonged to different generation units of that actual generation”.

<sup>5</sup> Inglehart (1977, 1981, 1990a, 1990b), Dalton (1977), and Abramson (Abramson and Inglehart 1992, 1994, Inglehart and Abramson 1994), and Flanagan (1982a, 1987) among others have also made important contributions to the area.

<sup>6</sup> Dalton (1988:77) explains that “value priorities identify what are important to citizens - what are, or should be, the goals of society and the political system.”

which materialist values (for example, economic and physical security) dominate (Inglehart 1990b:47). Inglehart links value priorities with generational change, by claiming that a shift in the value priorities of Western publics has occurred since the second World War. According to Inglehart (1977:3) the “values of Western publics have been shifting from an overwhelming emphasis on material well-being and physical security toward greater emphasis on the quality of life”.

Inglehart’s explanation of generational value change rests upon two key hypotheses, known as the ‘scarcity’ and ‘socialisation’ hypotheses. The scarcity hypothesis contends that individuals place a greater emphasis upon needs that are in short supply. When a need is unfulfilled, its satisfaction becomes an important goal. However, when the needs in question are satisfied, they tend to become taken for granted, and attention shifts toward other ‘higher order’ needs - “given individuals pursue various goals in hierarchical order-giving maximum attention to the things they sense to be the most important unsatisfied needs at a given time” (1971:991).

The ‘scarcity’ hypothesis is based upon the need hierarchy suggested by the psychologist Abraham Maslow (1970:59) who claims that human needs are ordered hierarchically in terms of their relative importance:

the chief principle of organisation in human motivational life is the arrangement of basic needs in a hierarchy of less or greater priority or potency. The chief dynamic principle animating this organisation is the emergence in the healthy person of less potent needs upon gratification of the more potent ones. The physiological needs, when unsatisfied, dominate the organism, pressing all capacities into their service and organising these capacities so that they may be most efficient in this service. Relative gratification submerges them and allows the next higher set of needs in the hierarchy to emerge, dominate and organise the personality, so that instead of being e.g., hunger obsessed, it now becomes safety obsessed. The principle is the same for the other sets of needs in the hierarchy, i.e., love, esteem, and self-actualisation.

Following Maslow, Inglehart suggests that physiological needs are the most important, followed by safety needs (see Figure 3.1).<sup>7</sup> When these ‘material’ needs

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<sup>7</sup> Physiological needs sometimes override safety needs, for example when the desire for food outweighs the possible danger involved in its procurement.



have been met, individuals pursue non-material needs, or 'goals'.<sup>8</sup> The need for love, belonging and esteem are next, and at the very top of the need-goal hierarchy are the self actualisation needs, which are related "to intellectual and aesthetic satisfaction" (1977:22). Self actualisation needs are sought only when both material and belonging needs have been satisfied. Therefore, in Western societies, that have "for a number of years experienced exceptionally high levels of economic and physical security" (in other words most basic needs have been met) people "give increasing emphasis to other types of needs" (Inglehart 1977:22).<sup>9</sup>

(Figure 3.1 about here)

Inglehart's second basic hypothesis concerns socialisation. It states that "people tend to retain a given set of value priorities throughout adult life, once it has been established in their formative years" (1977:23). Combining the 'scarcity' and 'socialisation' hypotheses produces the following proposition: value priorities are shaped by the satisfaction or non-satisfaction of hierarchically ordered needs, and once formed persist over time - as "people tend to retain a basic character throughout adult life once it has been formed in childhood and youth" (1977:23). Hence the link with generations. Generation effects persist because value orientations formed in childhood or early adolescence remain relatively stable over time.<sup>10</sup>

From this theoretical platform Inglehart (1977:23) is able to claim that "we should find substantial differences in the values held by various age groups." Changes in value orientations in advanced societies occur largely as a result of two factors: the relative prosperity experienced by Western nations in the period following

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<sup>8</sup> Inglehart tends to use the terms 'needs' and 'goals' interchangeably.

<sup>9</sup> Maslow's hierarchical ordering of needs is not without its detractors (for example, see Eckersley 1989:216). In fact Inglehart (1981:881) concedes; "The rank ordering of human needs becomes less clear as we move beyond those needs directly related to survival. But it does seem clear that there is a basic distinction between the 'material' needs for physiological sustenance and safety, and nonphysiological needs such as those for esteem, self-expression and aesthetic satisfaction".

<sup>10</sup> In this sense values differ from attitudes. McAllister (1994:31) suggests that "While political attitudes are the result of experiences gained in later life and may change through the course of time, values usually remain embedded in the individual's personality and provide a guide to both political outlooks and action".

the Second World War (1950s-1970s), and the absence of local wars and conflicts in the West during that period. Older (Western) generations whose formative experiences occurred during times of economic hardship and physical danger (for example, before World War II) tend to hold materialist values. Younger people born and brought up in prosperous economic circumstances free from the threat of total war are more likely to exhibit post materialist values.<sup>11</sup> The percentage of post materialists “should be smallest among the oldest cohorts, if, indeed, values tend to reflect the conditions prevailing within a society during a given cohort’s pre-adult years” (1977:23). In the process of generational replacement, the proportion of postmaterialists in advanced Western countries should continue to increase, with older materialists gradually being replaced by younger postmaterialist generations (1990b:51).<sup>12</sup>

Inglehart’s empirical analyses of the materialist/postmaterialist value distinction are based upon responses to simple questionnaire items. The more widely employed short questionnaire has four responses.<sup>13</sup> Respondents who choose both the first and third options are deemed ‘materialists’, while those choosing the second and fourth options are ‘postmaterialists’. The remaining combinations (which in all surveys comprise a large majority) form the residual or ‘mixed’ category.<sup>14</sup>

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<sup>11</sup> It is important to note that the majority of people in Western publics are neither materialist nor postmaterialist, but fall into the mixed category. Therefore, although younger generations may be more postmaterialist than their parents, the overall percentage of postmaterialists in Western countries is still rather small. In Australia in 1993, approximately 14% of the population were postmaterialists and 21% materialists. The remainder, approximately 65% of the population held mixed value orientations (Source: AES 1993).

<sup>12</sup> Inglehart (1994:337) acknowledges that what he terms he calls ‘period effects’ also impact upon the formation of values. Period effects are usually brought about by economic phenomena, such as inflation or recession.

<sup>13</sup> If you had to choose among the following things, which are the two that seem most desirable to you?

- 1 Maintaining order in the nation.
- 2 Giving the people more say in important political decisions.
- 3 Fighting rising prices.
- 4 Protecting freedom of speech. (Source: Inglehart 1977:28).

Inglehart (1977) also uses a more elaborate 12 item questionnaire see Figure 3.1. However, the original is more well known and remains the most widely used measure of value orientations. It must also be said that Inglehart does not maintain that childhood socialisation completely determines one’s value priorities. In fact he suggests “[I]t would be ridiculous to argue that no change in basic values occurs during adult life...Our point is simply that the probability of such change diminishes substantially after one reaches adulthood” (1977:23).

<sup>14</sup> The ‘mixed’ value category is theoretically uninteresting, and largely ignored by Inglehart and his followers.

Inglehart (1981:898) claims that the “conflict between those seeking Materialist and Post-Materialist goals has become the basis of a major dimension of political cleavage, supplementing though not supplanting the familiar polarisation between labor and management”. The distribution of post materialist and materialist value orientations also varies across national boundaries “in a predictable fashion”, in that “the differences in values across a given nation’s age groups tend to reflect that nation’s history during the lifetime of the people in the sample” (1977:24).

### *Generations, values and environmentalism*

Postmaterialist value orientations are often associated with increased involvement in new social movements, especially environmental movements (Inglehart 1990a, 1990b, Watts and Wandesforde-Smith 1981, Milbrath 1981). Inglehart (1990a:66) explains the rise of these new political phenomena by claiming that a “process of intergenerational value change is gradually transforming the politics and cultural norms of advanced societies. A shift from Materialist to Postmaterialist value priorities has brought new political issues to the centre of the stage and provided much of the impetus for new political movements”. He suggests that there is a strong relationship “between Post-Materialist values and a predisposition for unconventional protest”, and that “postmaterialist values underlie many of the new social movements” (1981:891;1990a:373). These new postmaterialist value priorities are also over represented among the supporters of “environmentalist movements and parties” (Inglehart and Abramson 1994:336). Postmaterialists make “an explicit reference to the quality of the physical environment; and...with a concern for the quality of the social environment: they seek less hierarchical, more intimate and informal relations between people” (Inglehart 1990b:45). They are also strong opponents of nuclear energy, and nuclear weaponry:

nuclear power tends to be rejected not only because of its potential dangers but because it is linked with big business, big science and big government-bureaucratic organisations that are evaluated negatively because they are inherently impersonal and hierarchical, minimising individual self-expression and human contact (1981:896).

Postmaterialists are more politically active than materialists, because while “Materialists tend to be preoccupied with satisfying immediate physiological needs; Post-Materialists feel relatively secure about them and have a greater amount of psychic energy to invest in more remote concerns such as politics” (1981:890). They are also “less supportive of the established social order, and subjectively, they have less to lose from unconventional political action than Materialists” (1981:890).

However, changing value priorities are not the only important causes of new politics. Inglehart (1990b:44) also suggests that a high level of ‘cognitive mobilisation’ is an important determinant of new political preferences and involvement:

the impact of values on political behaviour tends to be greatest among those with relatively high levels of education, political information, political interest, and political skills: in short among those with high levels of cognitive mobilisation (1990b:44).

The increase in levels of cognitive mobilisation among Western publics also leads to increased support for new political activities, as “the emergence of new social movements owes much to the gradually rising level of political skills among mass publics, as education has become more widespread and political information more pervasive” (1990b:44).

However, while Inglehart’s value change thesis remains an important and influential explanation of some aspects of political behaviour, it is not without its critics. A variety of criticisms are advanced, which may be divided into theoretical and methodological problems.

### ***Theoretical consistency and empirical fit***

Although Inglehart uses the concept of generation, it is not theoretically developed in his work. Rather he uses generation in order to explain how value priorities *change* over time. In doing so, he seems to place too much emphasis on the nature of values, and not enough upon the generational mechanisms of value-acquisition. Mannheim’s (1972) distinctions between ‘generational locations’, generations as ‘social actualities’ and ‘generational units’ are ignored by Inglehart.

Perhaps this is due to his method of empirical evaluation, and his propensity to use exclusively survey data.<sup>15</sup> Whatever the reason, it seems that contemporary theorists using the concept of generation could make more of Mannheim's conceptual distinctions. In particular, Mannheim's (1972:304) notion of generation units, defined as "groups within the same actual generation which work up the material of their common experiences in different specific ways" appear to have direct application to value change studies. Inglehart's research shows that generations allegedly experiencing similar formative experiences produce both postmaterialists *and* materialists. Perhaps Mannheim's concept of generational units could be employed to explain why this is the case.

The basic hypotheses upon which Inglehart's theory of value change rests have also been challenged. Boltken and Jagodzinski (1985:453-54) suggest that Inglehart specifies the relationship between the 'scarcity' and 'socialisation' hypotheses in an ambiguous manner, that he offers two different explanations of value change, and tends to alternate between them. They argue that Inglehart's first 'core model' stresses the socialisation hypothesis and underplays the scarcity hypothesis. The second 'soft model' emphasises the importance of the scarcity model for explaining adult behaviour. Boltken and Jagodzinski (1985) maintain that it is contradictory to hold the scarcity and socialisation hypotheses simultaneously. They suggest that

If the responses to the value index reflect internalised value orientations, they should be fairly stable in adulthood. If on the other hand, respondent behaviour is affected to a larger extent by economic changes, usually no stability can be expected. But the same sequence of actions cannot be both stable and unstable (1985:454).

Inglehart (1985) responds to these criticisms with the counter-claim that his thesis has been misinterpreted. He argues that "Boltken and Jagodzinski's assumption that I alternate between two different models is based on a simple conceptual error: the belief that period effects are incompatible with stable and

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<sup>15</sup> For example, using survey data it would be difficult to identify generations as 'actualities' where a "concrete bond is created between members" (Mannheim 1972:304), or as 'generational units' that share a "community of experience and feeling" (O'Donnell 1985:2).

persisting cohort differences” (1985:497). Value orientations held by certain age cohorts may change in response to ‘period’ effects (such as rises in inflation), while “stable and persisting cohort differences” still remain (1985:495-500).

Duch and Taylor (1993) attack the link between economic conditions during the formative years and the formation of value priorities. They claim that “early economic conditions do not actually affect how respondents rank Inglehart’s postmaterialist items. Education and economic conditions at the time of the survey are much more important explanations for variations in the postmaterialist measure” (Duch and Taylor 1993:747). However, Abramson and Inglehart (1994:798-799) are again able to rebuff their critics by claiming that Duch and Taylor (1993); i) truncate the variance on “variables crucial to testing the theory”, ii) “misinterpret the role of education” in that they “discount the possibility that education is a powerful indicator of the respondent’s economic security during their formative years”, iii) “argue that the fluctuation of values with current inflation rates demonstrates that formative socialisation is unimportant. In fact, period effects are frequently found with long-term birth cohort effects and are perfectly compatible with them”, iv) “conclude that economic security is not related with postmaterialism at the aggregate level” while Abramson and Inglehart “clearly demonstrate a strong relationship between economic prosperity and postmaterialism”, and v) “confuse the effects of high *levels* of GNP/capita and the effects of economic growth”.

Eckersley (1989:219) suggests that Inglehart “inclines toward ‘vulgar idealism’ in focusing on the subjective values of individuals and ignoring the relation these values have to the objective changes that have taken place in the physical and social environment since 1945, other than rising levels of affluence”. She recommends that “other important factors” need to be considered, such as “the degradation of the environment, the changing cultural milieux and the expansion and changing nature of higher education” (1989:219). Although, as noted above, in a later work Inglehart (1990b) does consider the impact of education and other factors, which he collectively refers to as ‘cognitive mobilisation’ potential.

Inglehart's failure to adequately link postmaterial values with sociostructural categories is also seen as problematic. Alber (1989:196) argues that " 'Values' are certainly important, but as a tool for macro analysis the concept seems useful only, if values are conceived as stable orientations which may be linked to specific milieus in the social structure". For example, Inglehart does not adequately specify the relationship between values and class location. He states; "I suggest that the rise of Post-materialism and its subsequent penetration of technocratic and professional elites has been a major factor behind the emergence of the New Class" (1981:895), thus advocating the notion of a new class based upon values. Yet if this is the case, his new class is a socio-cultural rather than socio-economic phenomenon, and as such more closely resembles a status category.

Inglehart's scarcity hypothesis based upon Maslow's need hierarchy is also the subject of criticism. In his assessment of values in Britain, Marsh (1975) distinguishes 'public values' from 'private values'. He suggests that the two often diverge because the "values one deems to be desirable for the political community and for the conduct of national affairs need not be those one embraces for the conduct of one's own affairs" (1975:28). Marsh (1975:29) maintains that "the theory of motivation proposed by Maslow is a theory of *individual* thought and behaviour", which "points the way to self-actualisation, not national actualisation". In his own research findings, Marsh (1975:29) finds that the British public "have 'higher-order' public values and 'lower-order' private values to an extent that is simply not consistent with Maslow's theoretical framework nor with the use Inglehart made of it".

There is also some disagreement among critics and supporters of Inglehart as to whether needs (at least beyond the level of physiological needs) are hierarchically ordered, and if so, as to how they are ordered. Eckersley (1989:216) notes that "Maslow himself has acknowledged that his theory of human motivation requires revision on the ground that it is not always the case that basic need gratification *automatically* leads individuals to explore their higher meta-needs." Anderson (1990:105) also attacks Inglehart's usage of the Maslowian need hierarchy, by

suggesting that a “careful reading of Maslow will reveal that the need hierarchy scale that he describes is somewhat different from that implied in the post-materialism thesis”. However, she suggests that even if Maslow is correctly interpreted his model is still problematic.

Although we might concede that basic needs are primary, it seems probable that people might wish to make their own hierarchical arrangement of needs rather than adhering to Maslow’s scale. Beyond the need for survival, human needs contain a subjective element best understood by listening to the motivations of the subjects themselves. This is particularly true if we are to use human needs and priorities to understand the motivation to political action (1990:106).

Cotgrove and Duff (1981:97) further question “the view that needs underlie choices, and choices are the expression of values”.

It is this theory which attempts to derive values from need deprivation and satisfaction which we would wish to question as a complete account of both the generation and distribution of values. A theory which puts so much weight on needs seems to underplay the intentional or goal oriented character of human behaviour (1981:97).

In an empirical evaluation of the relationship between the need hierarchy, values and micro- and macro-economic conditions in the USA and Germany, Trump (1991) also identifies a number of problems with Inglehart’s thesis.<sup>16</sup> Trump suggests that his own research “refutes the theoretical contention that economic conditions, through their effect on the positions of individuals in the need hierarchy, are the primary cause of materialist and postmaterialist values” (1991:382). He also questions whether ‘materialist’ and ‘postmaterialist’ values orientations are actually ‘values’, or whether they “may not be more transient social and political ‘attitudes’ ” (1991:382).

Abramson and Inglehart (1994:806-7) respond that Trump’s sample is flawed, and

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<sup>16</sup> Trump (1991:370) sampled secondary school students as the “psychological development literature” suggests “the cognitive capacity that is necessary for abstract reasoning does not develop until adolescence”. Trump also justified the use of secondary students due to the fact that “secondary schools are the last educational setting at which students from all social and economic backgrounds are present”, and because it “allows the independent effects of higher education on value formation, which Inglehart (1977) has shown to be important to be controlled. Thus this design provides a means of isolating and assessing the impact of material well-being on value formation at the time of life at which it is supposed to be occurring” (1991:370). See Trump (1991:370) for references on ‘psychological development literature’.



that his study “provides an interesting case of truncated variance on the crucial variable”. They note that Trump’s results contrast with Dalton’s (1977) findings, and their own studies, both of which are based upon much larger samples.

However, in seemingly tacit recognition of the problems associated with the Maslowian model, Inglehart appears to have largely abandoned it in his later work (Flanagan 1987, Eckersley 1989). Instead, he employs the principle of diminishing marginal utility (DMU) to explain the shift from economic to non economic value priorities, claiming that it is similar to the scarcity hypothesis (1990b:47).<sup>17</sup>

The recent economic history of advanced industrial societies...are a remarkable exception to the prevailing historical pattern: the bulk of their population does not live under conditions of hunger and economic insecurity. This fact seems to have led to a gradual shift in which needs for belonging, esteem and intellectual and aesthetic satisfaction become more prominent. We would expect prolonged periods of high prosperity to encourage the spread of postmaterialist values; economic decline would have the opposite effect (Inglehart 1990b:47).

However, as Flanagan (1987:1310) remarks, “an estimation of the diminishing marginal utility of added increments of income is a rational-choice assessment based on the individual’s current level of need and sense of relative deprivation. This assessment, then, is very much a *context-dependent* phenomenon”. Inglehart has been able to use the DMU argument by changing the “relevant context from the individual level, a level at which we would expect considerable change across the life cycle, to the societal level” (Flanagan 1987:1310).

The DMU thesis is important in relation to levels of postmaterialism and materialism held by various generations or cohorts, and consequently support for new social movements. It opens the door to alternative value shifts, as it allows for the possibility of a shift back toward materialist value orientations if “serious economic problems arise” (Flanagan 1987:1310). This is especially applicable to the youngest

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<sup>17</sup> The principle of diminishing marginal utility states that “economic factors tend to play a decisive role under conditions of economic scarcity; but as scarcity diminishes, other factors shape society to an increasing degree” (Inglehart 1987:1289). Flanagan (1987:1309) also notes; “as the margin of surplus income increases, the citizen’s expenditure of energy in support of economic issues will yield a diminishing marginal utility, and the non-materialist is born.”

age cohorts (whose formative years encompassed the high inflation and economic recessions of the 1970's and 1980's).<sup>18</sup> If the level of postmaterialist values held by younger cohorts decreases, then support for the environment movement should also decrease among these cohorts. In fact, Inglehart and Abramson (1994) acknowledge the existence of 'period effects', suggesting that continuous increases in the levels of postmaterialism are by no means certain.

Although generational replacement is likely to push postmaterialism upward, our time series analyses demonstrate that economic forces (especially changing inflation rates) can effect value change. Thus, while a trend has been clearly documented and although young Europeans have remained more postmaterialist despite their own aging, economic forces can influence the pace, and even the direction, of future value change (Inglehart and Abramson 1994:351).

However, postmaterialist support for environmental politics remains strong. In an analysis of the German Green party, Veen (1989:42) finds materialist values to be "practically non-existent among the Greens". He suggests that the core values of Green party supporters resemble Inglehart's postmaterialist category, and include "unrestricted freedom of speech, individual freedom, personal development, equality for women, a willingness to accept new ideas and the right of co-determination at work" (Veen 1989:42).

### *Methodological problems: values and generations*

There are a range of criticisms aimed at the validity of Inglehart's value indices, and his claims regarding generational differences in value priorities. In particular critics stress that one can not be certain that Inglehart's attitude scale actually taps underlying values.<sup>19</sup> Papadakis (1993:18) maintains the scale "reflects attitudes

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<sup>18</sup> Flanagan's own explanation of value change is summarised by Dalton, Beck and Flanagan (1984:20). They suggest "Scott Flanagan has conceptualised the process of value change in somewhat different terms-as a decline in respect for authority, conformity, religiosity, and the work ethic...In place of these more traditional values, he finds a growing emphasis on values that are instrumental for securing the goal of self-actualisation-self-assertiveness, nonconformity, openness to new ideas, equality, the pursuit of leisure activities, a better quality of life, and a tolerance for a variety of life-styles".

<sup>19</sup> Flanagan (1982b:110) suggests there is a "measurement-level problem" with Inglehart's scale, in that it "taps values in the public rather than the private domain". He maintains that respondents are asked to rank socio-political goals, which in many cases they may not be experienced with (Flanagan 1982b:110). They may not give much prior thought to goals such as "the need for economic growth,

toward particular issues. Though attitudes often reflect values, they should not be confused with them". Inglehart's most commonly used measure of value orientations is the four item index which he administers to a wide variety of respondents across a number of countries (mainly via the Eurobarometer surveys). However, panel studies are rarely used.<sup>20</sup> Without the utilisation of panel studies it is difficult to assert with a high degree of certainty that value priorities are in fact changing to become more postmaterialist with each successive generation. Lowe and Rudig (1986:517) suggest some authors "have reassessed Inglehart's findings on value change in Japan, arguing that ageing rather than generational change is wholly or partly responsible" (see Flanagan 1982a, Jagodzinski 1983). However, Inglehart (1981), and Inglehart and Abramson (1994) again respond to such criticisms by claiming that generational replacement rather than ageing effects lead to a change in value orientations. Although they maintain their empirical analysis "does not conclusively disprove a life-cycle interpretation", Inglehart and Abramson (1994:339) suggest

it becomes clear that there is no overall tendency for birth cohorts to become more materialist as they age. That cohorts do not become more materialist as they age undermines a life-cycle interpretation for the relationship between age and materialism.

Flanagan (1982b:110) agrees with Inglehart that basic values are held in a relatively stable manner throughout life, yet suggests that 'needs' are subject to abrupt and dramatic change. Therefore, need priorities may change not with generations, but "along with environmental conditions and life circumstances" (1982b:110). This problem "is not resolved by a shift in measurement level from the public to the private domain" (1982b:110). He also criticises the 'priority ranking' approach adopted by Inglehart in his 4 item value index, where respondents are constrained by being forced to choose two out of four items. Seemingly difficult to please, Flanagan (1982b:111) argues that if respondents are faced with too few choices missing data problems may

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or national defence", which can result in a scale that does not actually tap underlying values (1982b:110). He suggests, "Where ill-considered attitudes or nonattitudes prevail, we will encounter instability and priority rankings will be determined more by external factors independent of the individual's basic value preferences" (1982b:110).

<sup>20</sup> Although Inglehart does present the findings of a panel study in *Culture Shift* (1990a:310), this method of analysis is uncommon in studies of value priorities.

arise, while if the number of choices are increased, “one runs into the problems of reliability”.

In a later work, Flanagan maintains Inglehart’s scale is not a valid measure of the Materialist/Post-Materialist phenomenon, as only one response (Fighting Rising Prices) taps Materialist value orientations. He claims that “while Inglehart labels his scale post-materialist, 75% of the items used to operationalise the scale rather tap the authoritarian-libertarian dimension” (1987:1311).<sup>21</sup>

Similarly, Clarke and Dutt (1991:918) claim that Inglehart’s four item index is “very sensitive to short-term changes in economic conditions that alter the public political issue agenda”. Specifically, they maintain that rises in the unemployment rate can result in an overstatement of the percentage of postmaterialists as measured by Inglehart’s 4 item scale, as the ‘more say in government’ item is strongly correlated with concerns about unemployment. As a consequence of this,

Increases in the jobless rate have a large *negative* impact on the percentage of materialists, and a *positive* impact on the percentage of postmaterialists, measured both relative to the percentage of materialists and absolutely (Clarke and Dutt 1991:911).<sup>22</sup>

Finally, Bean and Papadakis (1994) argue that the postmaterialist-materialist dimension identified by Inglehart is more appropriately conceptualised as two distinct dimensions. In an analysis that employs both Inglehart’s “ranking method”, and “an alternative rating method” of value measurement, they find that the

two-dimensional solution provided by the rating method is...a more theoretically appropriate way of understanding Materialist and Postmaterialist values than the notion of a single conflict dimension, since it allows a more flexible and realistic account of the choices made

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<sup>21</sup> Flanagan’s libertarian category approximates Inglehart’s postmaterialists. Flanagan (1987) again attacks Inglehart’s 4 item index, noting that the values Inglehart attempts to tap include not only materialist and postmaterialist orientations, but also what Flanagan terms ‘authoritarian’ values. He suggests that Inglehart’s four response post-materialist question combines economic (materialist) values with authoritarian values, which are “concerns for security and order...respect for authority, discipline and dutifulness, patriotism and intolerance for minorities, conformity to customs, and support for traditional religious and moral values” (1987:1305).

<sup>22</sup> Clarke and Dutt (1991:918) conclude that the “four item battery is defective because of its strong sensitivity to short-term changes in the salience of inflation and unemployment on the issue agenda”. Inglehart and Abramson (1994) respond to Clarke and Dutt in their usual manner by presenting analyses of larger samples from a greater number of countries than their detractors. They suggest that “Although at certain times high rates of unemployment happened to coincide with a rise in postmaterialism, the apparent causal linkage is spurious” (1994:346).

by most social actors - choices which may represent both Materialism and Postmaterialism (Bean and Papadakis 1994:264).

In response, Inglehart (1994:290) does not dispute the approach of Bean and Papadakis, but suggests

it depends on what aspect of reality one wishes to understand. If one is asking the question, 'Do people want to attain all of these goals, or only some of them?' then the rating format is appropriate, and the answer is clear: most people want all of them. But if one is interested in the question: 'What priorities do given people have, when forced to choose between two desirable goals?', then the ranking method is appropriate (Inglehart 1994:291-292).

Inglehart appears to underplay the extent to which different generations have an influence upon one another, even though their members may have experienced different formative experiences. As Mannheim (1972:301) suggests, "Generations are in a state of constant interaction", and "the younger generation tends to adapt itself to the older" while the "older generation becomes increasingly receptive to influences from the younger" (1972:302).

Inglehart's method of employing birth cohorts of fixed intervals to represent generations is also problematic, and even seems to contradict his basic hypotheses.<sup>23</sup> In his explanation of value change, Inglehart appears to employ a demographic rather than sociological definition of 'generations'. The former refers to fixed interval cohorts, the latter refers to groups of people with similar formative experiences. Inglehart claims that those *experiencing* more favourable economic and social conditions tend to be more postmaterialist. To evaluate empirically such an hypothesis, presumably one should first attempt to identify the important social and economic events that occurred during the lifetime of those in the sample. Generations would then consist of those who in their formative years experienced important socio-economic events in a tangible way.<sup>24</sup> Therefore, some generations would be larger than others, in response to variations in the scope and duration of periods of economic

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<sup>23</sup> For example, Inglehart and Abramson (1994) use the following cohorts in their discussion of value change: 1966-75, 1956-65, 1946-55, 1936-45, 1926-35, 1916-25, 1906-15, 1886-1905.

<sup>24</sup> Nor does Inglehart specify exactly what he means by the 'formative years'.

and social upheaval. By operationalising fixed year birth cohorts to represent 'generations', the different formative experiences of potential generation members are under emphasised.

However, despite the range of criticism advanced against various elements of Inglehart's generational value change theory, it remains one of the most important and widely used sociological accounts of transformations in political preferences and behaviour. While values are not strictly aspects of social location, Inglehart's value orientations are operationalised in the empirical chapters that follow, along with a variety of age and generation measures.

Generational explanations of concerns and activism are underdeveloped in sociology. While class accounts seem to be losing their popularity, generation accounts seem unlikely to take their place, in spite of the frequent use of the concept in popular and journalistic interpretations. There are also some lacunae in generational theorising, as signalled above. With their focus on explaining shifting values, contemporary generational accounts tend to downplay generational differences that exist between countries. Inglehart and others show that younger generations in Europe are more postmaterialist, and consequently more likely to support environmental movements and political parties than their older counterparts. Yet in Australian society, generational effects may be different and/or less pronounced. Although similar to Western European countries in many respects, Australia has been less affected than other societies by major social upheavals such as World War II. Fighting did not occur on Australian soil.<sup>25</sup> Consequently, the social and economic devastation that occurred in Europe had a lesser impact upon Australia. The subsequent postwar reconstruction also occurred on a much smaller scale in Australia than in Europe. While postwar generations in Australia are certainly more prosperous than prewar generations, economic events such as the post war 'boom' period were not as marked in Australia as in Europe. In Mannheim's terminology, conditions in

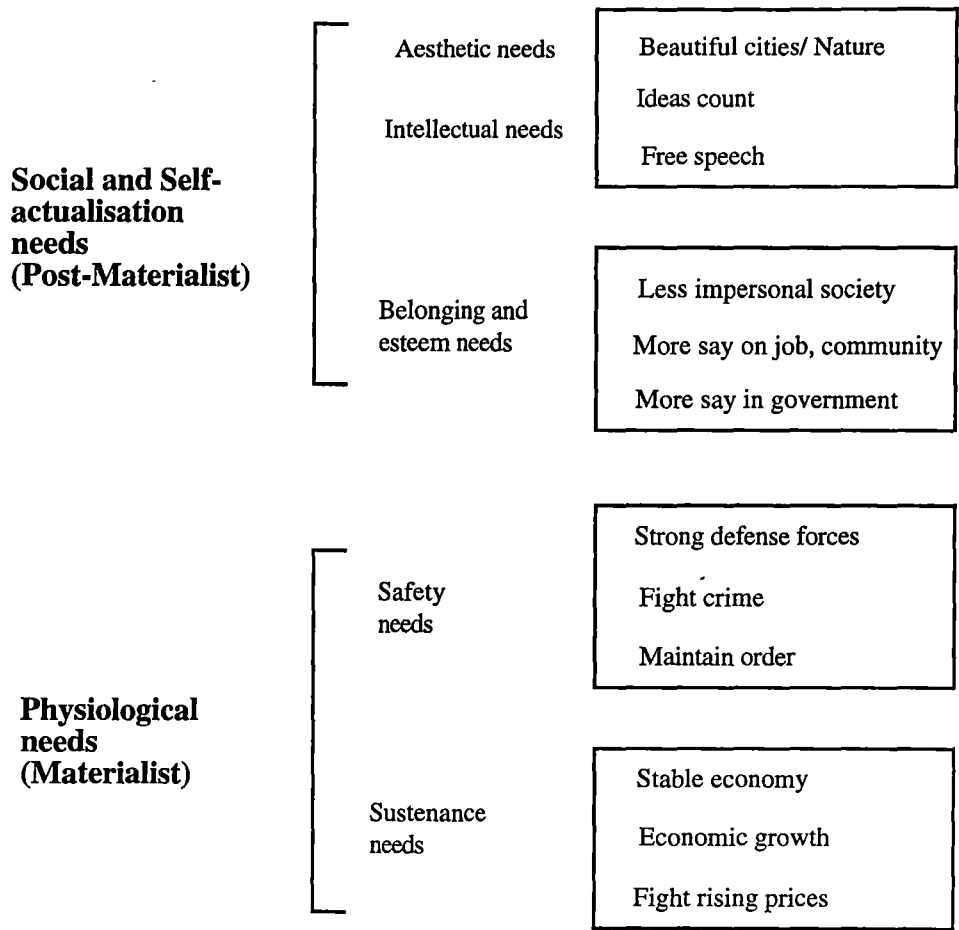
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<sup>25</sup> The exception being the attacks on Darwin by the Japanese airforce.

Australia may have prevented the formation of generations as 'social actualities' and 'generational units'.

If Inglehart's thesis is correct, the differences in value priorities between generations should also be less marked in Australia, as the differences in formative experiences from one generation to the next are less pronounced. This has particular relevance to this research, given the alleged link between postmaterialist value priorities and environmentalism. If differences in the values held by successive generations are less apparent in Australia, then generational differences in support for environmentalism may also be less clear cut than in other countries. Generational theorising and the methodology of generational research needs further development. At present, it appears to be the least elaborated of the three main theoretical models of politics - class, generation and status.

**Figure 3.1: Relationship between Maslow's Need Hierarchy and Inglehart's Value Orientations**



Source: Inglehart 1977:42



## **Chapter 4**

### **Status, Lifestyle and Other Explanations of Environmentalism**

Some alternatives to the well known new class explanations of environmental concerns and activism are examined in this chapter. They are mainly derived from the Weberian tradition and utilise the concept of status. The chapter has three sections. Firstly, drawing upon the work of Weber, Turner and Bourdieu, status, status groups and status 'blocs' are discussed. I also examine the argument that support for environmental concerns and activism may be understood as an aspect of 'lifestyle'. In the second section, a number of other social base explanations of environmental support are examined. These stress the importance of gender, urban/rural residence, religiosity, and country of birth. In the final section, some alternatives to 'social location' accounts are considered, including political ideology (left-right), political partisanship and the 'end of the social' interpretations.

#### **Status groups, lifestyle and politics**

While Marx is acclaimed as the father of class explanations of politics, the origins of status accounts are to be found in the work of Max Weber. In contrast to Marx, Weber viewed politics as not solely or even principally based upon class interests and class conflicts. Class was important, but it did not occupy a privileged position in his theoretical schema of politics. Weber considered class politics mainly in relation to the market-based modern Western capitalism, and saw status groups as of equal importance to class in the distribution of power.

Class is defined by Weber (1988:69) in terms of ownership or non-ownership of property, and, more importantly, "the marketability of goods and services". Classes are "stratified according to their relations to the production and acquisition of goods", while status groups are "stratified according to the principles of their *consumption* of goods as represented by special styles of life" (1968:937). Status is

“an effective claim to social esteem in terms of positive or negative privileges” based upon either “style of life...formal education” or “hereditary or occupational prestige” (1968:305-6). Status groups or *Standes* consist of a “plurality of persons, who within a larger group, successfully claim...a special social esteem” (1968:306). Thus conceptualised, status groups arise “by virtue of their own style of life, particularly in the type of vocation” (1968:306). Status groups may be closed, such as the hereditary Indian caste system, or open, such as modern occupational status groups (1961:405). Weber also distinguishes between ‘status situations’ and ‘class situations’. Class situations exist when

(1) a number of people have in common a specific causal component of their life chances, insofar as (2) this component is represented exclusively by economic interests in the possession of goods and opportunities for income, and (3) is represented under the conditions of the commodity or labour markets (Weber 1988:61).<sup>1</sup>

On the other hand, status situations are a typical component of the life fate of men that is determined by a specific, positive or negative, social estimation of *honor*. This honor may be connected with any quality shared by a plurality...it can be knit to a class situation...[but]...need not necessarily be...[O]n the contrary, it normally stands in sharp opposition to the pretensions of sheer property (Weber 1988:65).

The remaining element of the Weberian triad is ‘party’. Parties “reside in the sphere of power. Their action is oriented toward the acquisition of social power...toward influencing social action” (1968:938). In contrast to action related to classes and status groups, “party-oriented social action always involves association. For it is always directed toward a goal which is striven for in a planned manner” (1968:938). Parties may represent the interests of classes or status groups, or combinations of both, and while the goal of parties is to attain power, the means of achieving these aims are many and varied. They range from “naked violence of any sort to canvassing for votes with coarse or subtle means: money, social influence, the

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<sup>1</sup> The ideal typical concepts of status honour and market determined class are related to feudal and capitalist societal types respectively (Therborn in Giddens and Held 1988:235-6).

force of speech, suggestion, clumsy hoax...to the rougher or more artful tactics of obstruction in parliamentary bodies” (1961:194).

The discussion here focuses upon Weberian status explanations of politics. They may be contrasted with class explanations based on material interests.<sup>2</sup> Status accounts explain political behaviour in terms of the predominantly ‘ideal’ interests of distinct status groups (Pakulski 1993a:147). For example, Weber (1961:269) suggests that the work orientations and the “practical ethic” of many world religions are explicable in terms of the influence of certain status concerns and interests. He claims that “as a rule one may determine the strata whose styles of life have been at least predominantly decisive for certain religions” (1961:269). Bendix (1977:91-92) highlights this point well:

Confucianism was the ethic of government officials in the Chinese dynasties, men with literary education who excluded from their privileged position those who lacked the cultural prerequisites...Early Hinduism was also the product of cultured literati...the Brahmins were a fully recognised religious status group that placed its stamp on the social order...Buddhism [was a] movement of contemplative and mendicant monks...Early Islam was a religion of disciplined, world-conquering warriors, the highest stratum of Arab society...Judaism since the Exile was the religion of pariah people...despised by others and separated from them by ritual and legal barriers that limited social intercourse...Christianity originated as a doctrine of itinerant artisans”.

Status groups are propelled by mainly ‘ideal interests’, and tend to act in a value-rational (*Wertrational*) manner. Value rational action is typically “determined by a conscious belief in the value for its own sake of some ethical, aesthetic, religious or other form of behaviour, independently of its prospects of success” (Weber 1968:24-25). Some examples of value-rational action are

the actions of persons who, regardless of possible cost to themselves, act to put into practice their convictions of what seems to them to be required

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<sup>2</sup> For example, Kristol (1972:43) claims that conflicting class interests give rise to conflict between the new class and the business community, while Gerritson (1990) argues that the environmental movement serves the economic interests of certain new class occupations (see chapter 2). In Weberian terms, the pursuit of class interests is an example of instrumentally rational action (*zweckrational*); it is a means by which to attain “rationally pursued and calculated ends” (Weber 1968:24).

by duty, honour, the pursuit of beauty, a religious call, personal loyalty, or the importance of some "cause" no matter in what it consists (1968:25).

Support for environmentalism, according to followers of Weber, is more closely aligned with such a value-rational type of action than the instrumentally-rational type (Pakulski 1991). Environmentalism is a 'cause' to which large numbers of supporters rally, but it is a cause that is not easily linked with the sectional material interests of any class or economically circumscribed stratum (Pakulski 1993a). It may be linked with status groups and categories. Followers of Weber extend the notion of 'status' and 'status group' to all sorts of characteristics and collectivities. They note the importance of 'formal education' as a defining criterion of status location, as well as 'intellectual status', lifestyle and cultural consumption. I examine these (and some other) interpretations in the following sections.

### *Intellectuals, education and environmentalism*

There is considerable evidence to suggest that the highly educated are over represented among activists and supporters of environmental groups (Van Liere and Dunlap 1980, Milbrath 1984, Papadakis 1993, Crook and Pakulski 1995, Rootes 1995). There are also a number of theoretical arguments linking environmental support with highly educated social and cultural and human services professionals (Parkin 1968, Kristol 1975, Gouldner 1979, Kriesi 1989, Eckersley 1989).<sup>3</sup> Some of these accounts are discussed in the preceding chapters. I focus here upon those accounts that interpret environmentalism as a status related phenomenon.

It may be argued that supporters with these social characteristics belong to a status group of 'intellectuals' rather than a new class.<sup>4</sup> In the broadest sense, Lipset and Dobson (1972:137) suggest intellectuals are "those who are considered proficient in and are actively engaged in the creation, distribution, and application of culture".

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<sup>3</sup> Highly educated people are also consumers of 'high culture' (Bourdieu 1984), and consumption of 'high culture' is in turn linked with postmaterialist value orientations (Reimer 1989:122).

<sup>4</sup> As a point of clarification, it is not being suggested here that all highly educated people, nor the majority of new social movement supporters are intellectuals. Nor is it being argued that *environmentalists* comprise a distinct status group. However, it is claimed that intellectuals are an important category within new social movements, and that they are members of a distinct status group.

Bullock and Stallybrass (1977:315) maintain that intellectuals are “the custodians of the tradition of creative and critical thinking about the normative problems of their society and the efforts of men to relate themselves to symbols of meaning outside their immediate self-interest and experience”, while Brym (1980) defines intellectuals in a more inclusive manner. He claims they consist of “persons who, occupationally, are involved chiefly in the production of ideas (scholars, artists, reporters, performers in the arts, scientists, etc., as well as students in post secondary institutions, who are apprentices to these occupational roles)” (1980:12).

To Weberian scholars, it is not surprising that support for new social movements should come from such a social category. Participation in environmental activities and groups is the logical extension of the political and intellectual idealism expressed through the ‘culture of critical discourse’ typical of radical intelligentsia. Such idealism may be expressed through support for environmentalism as a ‘cause’, as suggested in Weber’s discussion of status politics and value-rationality.

Yet there is some disagreement as to who these ‘intellectuals’ are, and what constitutes a ‘radical’ cause. Eyerman (1994:1) claims that definitions of intellectuals fall into “two broad definitional categories: those attributing personal characteristics” such as “those ‘who never seem satisfied with things as they are’...on the one side, and those that look to social structure and function, on the other”. Lipset’s (1981:333) definition of intellectuals as “those who create, distribute and apply culture...including art, science, and religion” is an influential example of the latter approach. Konrad and Szelenyi (1979) use such a structural notion of intellectuals to explain political behaviour.

Some scholars distinguish intellectuals from the intelligentsia. Lipset (1981:333) explains that there are three ‘levels’ of intellectuals. These consist of two main levels: i) the creators of culture, and ii) the distributors of culture, and iii) a peripheral group “composed of those who apply culture as part of their jobs” (Lipset

1981:333).<sup>5</sup> According to Lipset (1981:333), the European 'intelligentsia' consists of all three types of intellectuals, while "in America...it is usual to include only the first two categories" when referring to 'intellectuals'.

Eyerman (1994:20) defines intellectual labour as "the application of the human intellect to gain a livelihood or for material gain", and also makes the distinction between intellectuals and intelligentsia.<sup>6</sup> The intelligentsia first emerged among the Russian and Polish bourgeoisie during the reign of Peter the Great, but only formed a collective identity in the 1860s (1994:21).

The cornerstone of this identity was an education in and an orientation towards European culture, especially its science and its technology...it was an orientation which came to identify Europe with modernity, with 'higher' education and 'intelligence'. The bearers of this modern culture came to identify themselves as the 'intelligentsia' (Eyerman 1994:21).

The term 'intellectual' originated in late nineteenth century France. It was first employed as a derogatory term aimed at the popular author Emile Zola, criticised for degrading cultural values by the academic establishment (Eyerman 1994:23).

The 'intellectual' became a contested concept and a *nom de guerre* taken on to do battle with the establishment. Thus the intellectual took on for a time the same connotations as the intelligentsia: an identifiable group with a self-proclaimed mission to defend 'culture', either by doing battle with all established authority or as the defenders of 'standards' against those who would denigrate them (Eyerman 1994:23).

Intellectuals, (at least contemporary intellectuals) tend to be politically left of centre and radical (Lipset 1981:338-341). Economic insecurity, and "an overproduction of educated persons" are said to lead to the radicalism of intellectuals, "at least at moderate to high levels of unemployment" (Brym 1980:15). 'Political extremists' are produced "by not giving intellectuals secure and responsible jobs commensurate with their training, and by restricting their freedom of expression and inquiry" (Brym 1980:17-18). On the other hand, intellectuals tend to be more

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<sup>5</sup> The first group comprises "Scholars, artists, philosophers, authors, some editors, and some journalists"; the second are made up of "performers in the various arts, most teachers, most reporters", and the peripheral group consist of "professionals like physicians and lawyers" (Lipset 1981:333).

<sup>6</sup> He suggests "all three rest upon the human capacity for reason and intelligence, the ability both to conceptualise and to apply the mind to some practical end" (Eyerman 1994:21).

‘moderate’ if they are “employed in secure and responsible positions commensurate with the types and levels of education they have received, and...they are relatively free to think and do as they will” (1980:17).

Radicalism is not a product of high education *per se*, it seems to reflect the *type* of education one receives. The humanities and social science disciplines in universities tend to “produce more radicals than disciplines generally identified as natural-scientific or professional” (Brym 1980:14). Rootes (1995:233) also notes that graduates from these disciplines are more likely to hold liberal social and political attitudes than other graduates. Given their radical heritage, it should come as no surprise that intellectuals are involved in environmental groups and movements as core activists and leaders.

Intellectuals are important to new social movements, because they “are needed to formulate policies and programmes and to create inspirational symbols and appeals. Without an intellectual elite to offer leadership and a coherent set of goals, popular demands or general discontents are rarely able to translate themselves into effective political movements on a mass scale” (Parkin 1968:93). Movement intellectuals also “contribute to the formation of the movement’s collective identity, to making the movement what it is” (Eyerman and Jamison 1991:94).

Although using the term ‘class’, Gouldner (1979) argues along the Weberian lines of ‘status politics’ (Pakulski 1993a:140). In his discussion of the ‘new class’ (identified as ‘radical intellectuals’), Gouldner distinguishes between ‘humanistic intellectuals’ and ‘technical intelligentsia’, groupings that have status rather than class characteristics. He suggests that they have ideological links with ‘environmentalism-ecology’:

The new ecological ideology signifies that the older instrumental ideology of the New Class is giving way to one with keener concern for the goals of action, and which refuses to surrender these to others and to limit itself to specifying the means of action. Its multi-science character provides an ideological framework that can unite various types of technical intelligentsia. At the same time its rejection of the idea of domination over nature, its intimation of a husbanding role and indeed of

a return to “nature”, is also attractive to many humanistic intellectuals” (1979:42).

Applying Gouldner’s ideas to ‘green politics’, Eckersley (1989) suggests that the ‘humanistic intellectuals’ are more likely than the ‘technical intelligentsia’ to be involved in ‘radical environmentalism’. She claims that the humanistic ‘intellectuals’ are more supportive of green politics because of “their greater relative autonomy from the production process (and hence greater alienation) and their closer adherence to the culture of critical discourse” (1989:221). In fact, Gouldner (1979:48) points out that while the interests of the intelligentsia are “fundamentally ‘technical’”, intellectuals’ interests “are primarily critical, emancipatory, hermeneutic and hence often political”. Critics, such as Bell (1979:20), argue that this Gouldnerian ‘new class’ has a socio-cultural rather than socio-structural basis. Given their socio-cultural heritage, intellectuals are better understood as comprising a distinct status category (Pakulski 1993a). As members of such a category, intellectuals may also exhibit similar styles of life.

### *Lifestyle, cultural consumption and status politics*

There are also quite different streams of status theorising. In an important contemporary work on social status, Turner (1988) identifies two distinct forms of status - ‘legal-political’ and ‘cultural’. Legal political status refers to “various entitlements within a nation-state; within this perspective the argument is that status has to be seen as the core element within the political notion of citizenship” (1988:65). Following Weber, Turner also distinguishes “a cultural dimension to social stratification in which we can conceptualise status not as political entitlement but as a lifestyle” (1988:66). The ‘cultural’ aspect of status is more relevant to this discussion.

According to Turner, stratification in contemporary Western societies is best understood not in class terms, but in terms of status groups, communities and ‘blocs’ struggling for power and supremacy. Status communities are a “genuine form of enduring community” where a *Gemeinschaft*-type relationship exists, and where individuals share characteristics such as “language, culture or ethnicity” (1988:12).



Status 'blocs' or 'columns' are "more like associations or organisations (*Gesellschaft* relationship) in which individuals form organisational structures for specific purposes" (1988:12). Turner (1988:44) points out that

Status politics emerges out of...struggles over different notions of equality, individualism and socio-economic conditions, whereby social groups seek through government intervention some compensation for their defacto inequalities.

In a somewhat similar vein, Waters (1994:298) argues that 'status communities' "form around differentiated patterns of value commitment, identity, belief, symbolic meaning, taste, opinion or consumption", and claims that these "strata are life-style and/or value-based status communities". Membership of such 'lifestyle groups' are distinguished not by their relations of production, but by their patterns of consumption and lifestyle. Pakulski and Waters' (1996) discussion of stratification in modern Western society also utilises such a model:

Status-conventional society is primarily a cultural phenomenon. It is based upon subscription to lifestyles that form around consumption patterns, information flows, cognitive agreements, aesthetic preferences and value commitments (Pakulski and Waters 1996:155).

Such conceptualisation of status/lifestyle divisions and stratification provide a point of departure for *status based* explanations of environmental new politics outlined by Turner (1979), and to a lesser extent by Pakulski (1991).

Studies of lifestyle and consumption owe their origin not only to Weber, but also to Veblen (1970). In the *Theory of the Leisure Class*, first published in 1899, Veblen studied the taste, lifestyles and 'conspicuous consumption' patterns of the so called 'leisure class'. The pioneering studies of Veblen on lifestyle and taste were developed more recently by Gans (1974), and Bourdieu (1984).

In a theoretical work on 'taste cultures' and 'taste publics' Gans (1974) links taste with what he terms 'class' location. He identifies five taste publics and cultures in American society: (high culture, upper-middle culture, lower-middle culture, low culture and quasi-folk low culture) that are differentiated according to "socioeconomic level or class" (1974:70). The relationship between education and cultural

consumption is also important, as “a person’s educational achievement and the kind of school he or she attended will probably predict better than any other single index that person’s cultural choices” (1974:75).

A similar, although more theoretically elaborate argument relating to taste and cultural capital is advanced by Bourdieu. In an examination of the taste culture of the French public, he attempts to provide “a scientific answer to the old questions of Kant’s critique of judgement, by seeking in the structure of the social classes the basis of the systems of classification which structure perception of the social world and designate the objects of aesthetic enjoyment” (1984:xiii-xiv). His main study is based upon survey data collected in 1963 and 1967-68, and is an attempt “to determine how the cultivated disposition and cultural competence that are revealed in the nature of the cultural goods consumed, and the way they are consumed, vary according to the category of agents and the area to which they are applied” (1984:13). Bourdieu (1984) distinguishes cultural capital (such as knowledge of the fine arts and literature) from economic capital.<sup>7</sup> He identifies “three zones of taste...[which]...roughly correspond to educational levels and social classes”, and posits a three-tiered model of cultural tastes, where the components are; ‘legitimate’ taste, ‘middle-brow’ taste and ‘popular’ taste (1984:16). The three taste cultures are associated with the upper, middle and working classes respectively. Those with the highest levels of education according to Bourdieu (1984:16), are more likely to exhibit ‘legitimate taste’. Moreover, there is a “very close relationship linking cultural practices...to educational capital (measured by qualifications) and...to social origin (measured by father’s occupation)” (1984:13).<sup>8</sup>

Yet the ‘classes’ to which Bourdieu and Gans attribute certain taste preferences and socio cultural and socio political dispositions resemble status groups. This is a point not missed by Turner (1988:66-7), who maintains that “While status is about

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<sup>7</sup> De Graaf and De Graaf (1988) note a number of similarities between Bourdieu’s and Inglehart’s theoretical schemes. They suggest that “the resemblance between the so-called materialist dimension and Bourdieu’s notion of an economic life style dimension is striking, whereas the postmaterialist dimension finds its place easily in Bourdieu’s cultural dimension” (De Graaf and De Graaf 1988:53).

<sup>8</sup> As Jenkins (1992:138) notes, for Bourdieu “people *learn* to consume culture, and this education is differentiated according to social class”.

political entitlement and legal location within civil society, status also involves, and to a certain extent is style. The location of a group within the social system is expressed by their taste, which is as it were the practical aspect of lifestyle". In fact in a later work, Bourdieu (1992:237) acknowledges that the "social space, and the differences that 'spontaneously' emerge within it, tend to function symbolically as a space of *life-styles* or as a set of *Stände*, of groups characterised by different life-styles".

Lifestyle may also be expressed politically in the form of 'life politics' (Giddens 1990, 1991, 1994). Giddens (1990:156) distinguishes such 'life politics' "which seek to further the possibility of a fulfilling and satisfying life for all", from 'emancipatory politics' which are "radical engagements concerned with the liberation from inequality or servitude". He suggests that "While emancipatory politics is a politics of life chances, life politics is a politics of lifestyle" (1991:214). Such

life politics concerns political issues which flow from processes of self-actualisation in post-traditional contexts, where globalising influences intrude deeply into the reflexive project of the self, and conversely where processes of self-realisation influence global strategies (Giddens 1991:214).

Social movements play an important role in "bringing life-political issues to the fore, and forcing them on public attention" (1991:228). This is especially so for the ecology movement, because it is the "material expression of the limits of modernity" (1994:227). Although Giddens does not explicitly link life politics with status groups, such a link appears obvious. If life politics is the politics of lifestyle as Giddens argues, and lifestyle is related to status groups, then life politics is synonymous with status politics. As an aspect of life politics, environmentalism is also the politics of lifestyle, and as such can be located in status groups or 'blocs'.<sup>9</sup>

In both the popular and academic literature on environmentalism, some supporters of green movements are also seen to adopt 'radical' or 'alternative'

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<sup>9</sup> Gerritson (1990) alludes to this point. He argues that the 'consumption' of wilderness is culture-based, suggesting that "Wilderness conservation effects a distribution towards a high-income, high-educational status group" (1990:5).

lifestyles.<sup>10</sup> However, it is acknowledged that the environmental supporters who adopt such lifestyles are more likely to be located on the fringe of green movements and groups (for example the radical 'feral' elements).<sup>11</sup> Veen (1989:50) describes such a 'left/alternative milieu': he suggests that it

ranges from so-called free schools practicing alternative reformist pedagogy and other educational institutions, to health food co-operatives, self-help groups, alternative trade, agriculture and services, or from alternative cultural institutions (bookshops, newspapers, magazines) to lawyers' and doctors' collectives.<sup>12</sup>

According to Poguntke (1993:32), an 'alternative subculture' in which some green supporters participate is "an independent source of political socialisation and education and hence capable, to a degree, of creating its own support". Those opting for 'alternative lifestyles' may also tend to support 'left-libertarian' political parties. However, it is not being implied that *all* or even the majority of environmentalists adopt radically different lifestyles, as Poguntke (1993:32) stresses, supporters of environmental new politics are "far from representing an homogeneous social group".

All of these theoretical accounts have some empirical backing. The literature on environmentalism reveals that supporters of green politics are typically highly educated, cognitively skilled, and located in professional occupations, all indicators of an 'intellectual' status. As the creators of ideas and culture, intellectuals consume culture, notably in a form that Bourdieu (1984) calls 'legitimate taste' and Gans (1974) refers to as 'high culture'. If environmental issue concerns and activism are concentrated in such status groups, consumption of 'high culture' and lifestyle may prove to be important explanatory factors and empirical indicators of environmentalism. This hypothesis is explored in the empirical chapters that follow.

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<sup>10</sup> 'Alternative lifestyles' encompass the type of food consumed, leisure activities, mode of dress and living arrangements (Metcalf and Vanclay 1987).

<sup>11</sup> The ferals or 'tribal folk' may comprise only a small percentage of forest protesters, but according to one environmental organiser they "are the ones that have the time and the energy to form a real basis and the core of the group. Without them it wouldn't be so effective" (Whittaker 1996:50).

<sup>12</sup> Poguntke (1993:32) also notes that in Germany there is "a vigorous subculture that ranges from biological food production, Third World shops and rural co-operatives to financial networks and international co-operation".

'Alternative' forms of health care is another aspect of alternative lifestyles. For example, Giddens (1994:225) claims that "those associated with ecological groups frequently favour 'natural' therapies over scientific medicine".

### *Gender and environmentalism*

Gender differences in support for environmentalism are also apparent, and as gender is an ascribed status, such accounts may also be seen as 'status explanations'. A number of studies have shown that women are more likely than men to be environmentally concerned and involved in environmental activism (Hampel et al 1995, Dalton 1994, Papadakis 1993, Milbrath 1984, Van Liere and Dunlap 1980). For example, Van Liere and Dunlap (1980:186 citing Passino and Lounsbury 1976) suggest that "males are more likely than females to be concerned about jobs and economic growth, and thus are less concerned than females with protecting environmental quality". Similarly, Barnes and Kaase et al (1979:110) note that direct action is more popular among (young) women than involvement in conventional forms of politics.

Dalton (1994:115-116) argues that women are more likely than men to support environmental movements because they "are socialised into nurturing roles that lead them to be more sympathetic to environmental issues and the New Environmental Paradigm. The feminist movement contributes to the cultural transformation that ecologists seek, in forms described as eco-feminism or feminist environmentalism". Milbrath (1984) also maintains that gender differences in environmental support stem from different socialisation patterns. He claims that the "nurturing and protective posture of females shows up particularly strongly in their opposition to nuclear power" (Milbrath 1984:75). In Australia, the influence of early socialisation on gender differences in environmental support is also highlighted by Hampel et al (1995). Australian research shows that women are less conservative on new political issues (Hayes and Bean 1994), and more supportive of environmental issues than men (Papadakis 1993:165).

Like new class and generational interpretations of environmentalism, status explanations locate support for environmental concerns and activism in certain social categories. However, unlike the new class accounts, where support is based upon socioeconomic interests, and generational accounts where it can be traced to

sociohistorical events and formative socialisation experiences, status explanations are based upon sociocultural differences. Status interpretations suggest that green supporters are typically driven not by material interests, but by value charged 'ideal interests'. Status categories such as the 'radical intellectuals' are highly educated, autonomous professionals, who produce and consume high culture, and tend to pursue the political issues that Giddens (1990, 1991) refers to as 'life politics'. They also appear as core activists and leaders in environmental movements and groups.

### **Problems with mainstream status accounts**

Status accounts are certainly not without their critics. Pakulski (1993a:146) is critical of what he terms the 'status politics' explanations suggested by Parkin (1968), and the Gouldnerian inspired accounts of Eckersley (1989) and Rootes (1990). He criticises status interpretations on two grounds, arguing that

by assuming that movements focus on sectional interests (of status categories), they have difficulties in handling the phenomenon of clearly universalistic concerns as articulated by most new (e.g. Green) movements. These concerns cannot be linked with any sectional interests or specific status group claims...Second, in their current version, the status politics accounts lack the universality of generational accounts and cannot be extended to non-Western mass movements, such as the Eastern European ones (Pakulski 1993a:147).

The status-based explanation of environmentalism outlined above largely avoid such criticism. Firstly, while support for environmentalism is linked to a distinct status group of intellectuals, it is not claimed that such support is based upon the *material* interests of this status group. Rather, environmental support from an intellectual status group is an example of Weber's value-rational action; it is an expression of ideal rather than material interests. This expression of idealism may, in turn, be linked with cognitive skills and an 'unattached position', or with 'the powerlessness' (in capitalist society) of intellectuals. Both hypotheses have at least some degree of plausibility.

With regard to Pakulski's second point, an explanation linking support for social movements with an intellectual status group may be more applicable to core

movement activists and leaders rather than to all supporters. Intellectuals have a history of participation as leaders and key activists in both old (labor) and new social movements, in the East and West. They have been involved not only in 'ecopax' movements as Parkin (1968), Gouldner (1979), and Eyerman (1994) suggest, but also in major revolutions (French Revolution, 1917 Bolshevik Revolution in Russia), and in more contemporary non-green movements such as Solidarity in Poland (Pakulski 1991:129).

Pakulski (1995:77) is also critical of accounts that "point to the importance of (high) education and professional status", such as that advanced by Rootes (1995), on the grounds that they lack "explanatory efficacy".

The error of such accounts is not in attributing high educational and certain types of professional status to movement supporters, but in attributing a distinctiveness - and therefore an explanatory potential - to this fact. To put it bluntly, all political activism - new and old, Left and Right - attracts a disproportionately high proportion of educated people with professional status...This is as true of Green movement activists as it is of Labour Party activists" (Pakulski 1995:77).

However, one may argue that *intellectuals* who are environmental supporters differ from conventional party activists in a number of ways, and therefore form a distinctive social category. They tend to be more socially and occupationally marginal or peripheral than activists in conventional political parties. Moreover, many movement activists are volunteer workers. Their motivation therefore tends to be more idealistic than materialistic.<sup>13</sup> Finally, their involvement seldom offers the high status similar to that available in conventional political hierarchies.

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<sup>13</sup> As many conventional party activists are paid party functionaries, and some seek to gain endorsement to run for parliament, they have a material interest in participating in conventional politics.

### **Other explanations of environmentalism**

A large number of other accounts of environmental support and activism also appear in the literature. These stem partly from the classical social base accounts, such as those outlined by Lipset (1981) which also stress the importance of religion, ethnicity and residential location.

### ***Environmentalists and religiosity***

Environmental support is differentiated in terms of religious denomination and religiosity. Although the relationship between religion and environmentalism is under theorised, and few empirical studies examine the relationship between religion and environmentalism, the available evidence suggests that the non-religious are over represented among supporters of environmental groups and movements. Inglehart (1990a:177-186) explains such findings by linking religious beliefs to value orientation. He argues that materialists are more religious than postmaterialists, because they have closer links with the traditional order. The less religious postmaterialists are more supportive of the new political configurations, including environmentalism. Based upon an analysis of new social movements (NSM's) in the Netherlands, Kriesi's (1989:1106) interpretation suggests that "the more one is integrated into church life, the less one is ready to participate in NSM's".

There is also some Australian evidence suggesting that the non-religious are more likely to support new political parties. In a recent study, Bean and Papadakis (1995:116) found that new political parties such as the pro-environmental Australian Democrats, and (to some extent) Green parties are more likely to be supported by the non-religious. One explanation is that green supporters are not non-religious, rather their religious beliefs are non-conventional. Easthope and Holloway (1989), for example, maintain that many environmentalists believe that the 'wilderness' itself is 'sacred'.<sup>14</sup>

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<sup>14</sup> They claim that The Wilderness Society (formerly The Tasmanian Wilderness Society) sought to "create for its membership a valuation of wilderness as sacred" (1989:195). The notion of the



### *Ethnicity and country of origin*

Support for environmentalism may also differ according to ethnicity, although once again, this area is lacking in theoretical development. Papadakis (1993:165) suggests that support for environmentalism, “at least in the form of organised campaigns that influence the policy agenda” may be weaker among non-English speaking immigrants. The lower levels of support among migrants from non-English speaking backgrounds is not due to a lack of concern for the environment, but rather “their order of priorities, especially as economic migrants may be different” (1993:165). McAllister and Studlar (1995:11) also find that migrants from English speaking countries are over represented as environmental activists. They suggest two reasons for this. Firstly, they argue that “while the Australian born take the quality of the environment for granted, immigrants do not”, and secondly, “while non-English speaking immigrants tend to migrate for material reasons - to acquire a better standard of living - English speaking migrants, while also materially oriented, may also be concerned about their quality of life” (1995:11).

### *Urban versus rural residence*

Previous studies of environmentalism and new politics generally found support to be stronger among urban dwellers. Van Liere and Dunlap (1980:184; citing Trembley and Dunlap 1978) suggest that there are a number of reasons for this. Firstly, urban dwellers are “exposed to higher levels of pollution and other types of environmental deterioration” (1980:184). Secondly, “rural residents are more likely than urbanites to have a utilitarian orientation toward the natural environment because of their involvement with ‘extractive’ occupations such as farming, logging and mining” (1980:184). However, if rural dwellers depend upon the environment for

their livelihood, it may be also be argued to the contrary that their interests are not served by its destruction.<sup>15</sup> A third reason is also advanced.

Because small towns need to maintain economic growth to survive, they are assumed to value growth over protection of environmental quality. Thus, the growth orientation of rural and small-town residents, not the utilitarian orientation of farmers and other rural residents, presumable accounts for the positive relationship between environmental concern and size of place of residence (Van Liere and Dunlap 1980:185, citing Murdock and Schriener 1977).

So far in this chapter, the discussion has centred around status accounts of environmental new politics, and also examined some other social base accounts. The next section looks at some important non social base accounts of environmentalism.

### **Non social base explanations of environmentalism**

#### ***Political ideology and partisanship***

The notion of social location is sometimes stretched to cover some aspects of ideological orientation. Although I exclude such accounts from 'social location' accounts proper, they are mentioned briefly in order to highlight their links with the mainstream 'social base' accounts, and because they are important indicators of environmental support in their own right.

There is a debate as to the relevance of the left-right cleavage for explaining environmental new politics (for example, see Offe 1985, Poguntke 1993). Inglehart and Sidjanski (1976:269) found that "among European publics one's sense of belonging to the left or right reflects party affiliations more than issue preferences".<sup>16</sup> Milbrath (1984:89) notes that while "environmentalists are left-leaning", they are also "more likely than other elites to have no position on this dimension". By contrast, Poguntke (1993:12) maintains that

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wilderness as 'sacred' also serves as a means of creating favourable public opinion toward the environment (1989:196).

<sup>15</sup> There is also a fine line here. For example, logging of old growth forests is seen by environmentalists as destruction of the natural environment, but may be viewed by many in rural communities as a sustainable use of a renewable resource.

<sup>16</sup> Nevertheless, they do not advocate abandoning measures such as left-right, or liberal-conservative ideology, suggesting "that they deserve high priority among the variables to be used for the study of long-term political change" (Inglehart and Sidjanski 1976:272).

“the New Politics is best understood as a left-wing addition to, and modification of, the traditional left-right dimension...Although there may be fierce conflict between the Old Politics Left and the New Politics Left, they are logically and empirically not independent of each other”.

Support for such interpretations may be growing. In a recent study, Inglehart (1990b) found that left-right self placement was an important predictor of participation in European ecology and peace movements. Some suggest that new political parties and social movements should be termed ‘left-libertarian’ (for example, Kitschelt 1990, Kitschelt and Hellemans 1990). Kitschelt (1990:180) maintains that left-libertarian parties are “ ‘Left’ because they share with traditional socialism a mistrust of the marketplace, of private investment, and of the achievement ethic, and a commitment to egalitarian redistribution. They are ‘Libertarian’ because they reject the authority of private or public bureaucracies to regulate individual and collective conduct.” Müller-Rommel (1990:213) also found that “several small European left-wing parties developed programs that strongly emphasise new political issues. The supporters of the environmental, the anti-nuclear, and the peace movements are able to identify with these parties”. In Germany, the new politics “is concerned with equal rights for all kinds of social minorities...a general left-wing orientation”, and is “situated on the left of the political spectrum” (Poguntke 1993:10-11). Finally, Dalton (1994:66) notes; “To an increasing extent, especially among the young, to be a leftist implies a commitment to environmentalism and green political values”.

Support for environmentalism in Australia is also related to identification with certain political parties (for example, see Papadakis 1993, 1994, Bean et al 1990). This is suggested by the ‘Michigan model’ of politics, where political attitudes and voting behaviour are linked to political party identification, or partisan self-image (Miller et al 1954, Campbell et al 1960, Miller 1976). The ‘Michigan model’ implies that politics in modern societies is a complex phenomena that “generates a tremendous amount of information”, and that party identification has a “simplifying function” by presenting an alternative to sifting through such a “flood of information” (Miller 1976:23). Party identification functions as a shortcut method of making decisions and

forming views on political issues. Political leaders “provide a ready cue to guide the political thought and action of the party identifier” (Miller 1976:23). Campbell et al (1960:133) also argue that party identification “raises a perceptual screen through which the individual tends to see what is favourable to his partisan orientation”. If such an explanation is correct, those who identify with a party whose policies are pro-environmental should be more sympathetic toward the environment than those who identify with parties that are neutral, or hostile toward environmentalism.

In Australia there are considerable differences among parties in respect of support for environmentalism.<sup>17</sup> The Australian Labor Party (ALP) enjoys a ‘greener’ image than the Coalition partners (Papadakis 1993:174), and has a history of accomplishments on environmentally related issues throughout the 1980’s (Papadakis 1994:67). Labor’s federal election win in 1990 is held to be at least partly attributable to support from the environmental movement (Bean et al 1990, Crook and Pakulski 1995). Given the relationship between partisanship and political issues implied by the ‘Michigan Model’, ALP partisans may be expected to be more supportive of green issues and groups than Coalition supporters.

The Australian Democrats have also undergone a considerable ‘greening’ throughout the 1980’s, and a variety of green parties and green independents have recently emerged in the political arena (Bean et al 1990). In fact, Papadakis (1993:174) suggests that “the closest connection is between environmentalism and new politics parties like the Democrats and various Green Independents”. It may be expected therefore, that Australian Democrat and ‘green’ partisans should also express the strongest support for environmental groups and issue concerns.

### *Civil society and the ‘end of the social’*

Some theorists attempt to explain social movements by locating them within the sphere of civil society (for example, Keane 1988, Misztal 1985). Bryant (1993:399) suggests that this linkage is not surprising, given that in sociology civil society is seen

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<sup>17</sup> Although these differences may be declining. The Coalition partners attempted to woo the green vote in the 1996 Federal Election by pledging to spend one billion dollars on ‘the environment’.

as “a *space or arena between household and state*, other than the market, which affords possibilities of concerted action and *social self-organisation*”. Kumar (1993:383) also argues that civil society “is seen as the source of a new politics to revitalise a bankrupt tradition, especially on the Left”. For Taylor (1990:96), civil society consists of “a web of autonomous associations, independent of the state” which have “an effect on public policy”. Cohen and Arato (1992:ix) see civil society “as a sphere of social interaction between economy and state, composed above all of the intimate sphere (especially the family), the sphere of associations (especially voluntary associations), social movements, and forms of public communication”.

Although they are fashionable, the civil society accounts share many problematic features, above all, vagueness. Pakulski (1995:71) argues that civil society is a vague term that “marks a predominantly West European perspective evolving out of critical re-evaluation of Marxist analysis”. Bendix (1991:143) appears to agree, suggesting that the “concept ‘civil society’ has become a polemical slogan opposed to Communist Party ‘dictatorship’ ”. Often labelled ‘post-Marxist’ due to their challenge to Marxism’s “economism, class reductionism, and the anti-capitalist stance critical of all bourgeois institutions”, civil society accounts “stress the novelty of the ‘new social movements’ and contrast them with ‘old’ social movements, mainly of the class-socialist type” (Pakulski 1995:71). Civil society accounts also tend to exaggerate differences between ‘old’ and ‘new’ social movements.

In their eagerness to present social movements as ‘positive’, democratising and emancipatory forces, they ignore those movements (e.g. Fascist) and forms of contemporary social activism (e.g. nationalist, fundamentalist) which do not fit the liberal-democratic sentiments underlying the civil society themes (Pakulski 1995:73-74).

Civil society accounts suffer from a conceptual stretch and vagueness which, as Pakulski (1995:73) notes, makes them “look more like *ad hoc* descriptions than theoretical explanations”. Since almost any social position can be linked with ‘civil society’, these accounts make any empirical evaluation virtually impossible.<sup>18</sup>

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<sup>18</sup> Given the vague nature of civil society accounts, they are excluded from the empirical analyses in Chapters 5-7.

Some theorists adhere to the so called 'radical decoupling' thesis, arguing that politics no longer has any stable social base. For example, Dalton et al (1990:12) suggests that new social movements "lack the narrow special interest appeal to any one social grouping". These new movements "signify a shift from group-based political cleavages to value-and issue-based cleavages that identify only communities of like minded people" (1990:12). Others arguing from a postmodern perspective go even further by advocating the wholesale abandonment of sociostructural explanations. Such accounts suggest that

We are moving towards a society without fixed status groups in which the adoption of styles of life...which are fixed to specific groups have been surpassed. This apparent movement towards a post-modern consumer culture based upon a profusion of information and proliferation of images which cannot be ultimately stabilised, or hierarchised into a system which correlates to fixed social divisions, would further suggest the irrelevance of social divisions and ultimately the end of the social as a significant referent point (Featherstone 1987:55-6).

Once again, it is difficult to evaluate such claims empirically, although the credibility of the 'decoupling' and 'end of the social' accounts would increase if social location effects are found to be weak or absent. Yet before we abandon them, social base explanations of politics should be given a fair trial. In the remaining (empirical) chapters, such a trial is conducted in a systematic way using nationally representative Australian survey data.

## **Chapter 5**

### **Research Design**

In this chapter I discuss the research aims, and the methodology employed in the empirical chapters. A number of aspects of environmentalism are operationalised in order to capture its diversity of meaning. The survey data is described, dependent variables, independent variables and predictor models are explained, and statistical techniques are discussed. Some preliminary analyses are also conducted for the development of the dependent variables, and in order to select appropriate class models for empirical analyses.

However, some qualifications should be made at the outset. First, any empirical evaluation is based upon the specification of theory and the operationalisation of key concepts. This process is not always straightforward, and therefore empirical 'tests' - including those below - may be accused of distortion. In order to address these potential problems, I examine and operationalise a number of models. Second, I assume that 'social base' is reflected in social composition - hence my use of survey data. This may seem an obvious approach, but may be questioned by some Marxist scholars. Third, the scope of this research is limited. I am mainly concerned with evaluating 'social base' explanations of environmentalism, in particular, class, status and generation accounts.

There is a dearth of research examining the relationship between (new) class(es) and new politics in Australia. Australian studies typically conceptualise class in terms of occupational status, or distinguish between the middle and working classes (for example, Papadakis 1993:153-169). Others employ subjective (self-identified) notions of social class (for example, Bean 1995). This research attempts to address this problem by operationalising a number of new class accounts.

Generational explanations are also popular, in particular Inglehart's (1977, 1990a) generational/value change thesis, and the association between education and

environmentalism is well documented (Van Liere and Dunlap 1980, Milbrath 1984, Papadakis 1993, Bean 1995). Some suggest that education is perhaps the most important determinant of environmental support (for example, Eckersley 1989, Rootes 1995). I argue in Chapter 4 that support for environmentalism may be strongest among highly educated, 'intellectuals'. If 'intellectuals' are associated with the production of culture and ideas, high cultural consumption may prove to be an important 'status' indicator of environmentalism. Gender, religion, ethnicity, and urban/rural residence are also linked with environmentalism (See Barnes et al 1979, Van Liere and Dunlap 1980, Milbrath 1984, Papadakis 1993, Bean and Papadakis 1995).

Leftwing political ideology (Kitschelt and Hellemans 1990, Dalton 1994), and new politics partisanship (Australian Democrats, Greens) may also influence environmental support, and although these political ideology measures are not aspects of the 'social base', it is argued that they may have an important impact upon support for environmentalism in Australia.

### **Models**

The various aspects of social location identified above, and the two political ideology measures are operationalised as predictor models (Table 5.1). The rationale employed here is to introduce blocks of explanatory variables in a logical and temporal order. The models employ independent variables that are causally prior to environmental support. They allow parental background and adolescent socialisation to be isolated from current social location effects.

Four predictor models are employed for these purposes. Model 1 consists of social background effects. These include father's class location, father's education, and parent's cultural consumption. Model 2 adds respondents' attributes, which include age, gender, value orientations, cultural consumption at age fourteen, and education. Cultural consumption at age fourteen is used rather than current cultural consumption, as it is seen to be prior to the formation of environmental attitudes and behaviour. Model 3 adds respondents' present social location variables - class



location, government sector employment, urban/rural location, religious affiliation, and ethnicity.

Finally, in Model 4, non social location variables - left-right political ideology and political partisanship - are added. It is recognised that these political ideology variables are not clearly prior to the dependent variables. However, it is argued here that they are prior. Political ideology and party identification are formed during childhood and early adolescence (Graetz and McAllister 1994:365). Political party identification and voting behaviour are strongly associated with parental partisanship and voting (Graetz and McAllister 1994:365).<sup>1</sup> Additionally, Baker et al (1981:195) note that party identification “is a very stable attitude that is often formed through the early-life learning of parental values”. Given that political partisanship and ideological position are formed during childhood or early adolescence, it is argued that they are causally prior to behaviour related to environmentalism, such as joining environmental groups.

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<sup>1</sup> An analysis of the Australian Electoral Survey found that 75% of respondents who identify as Coalition supporters indicated that both parents supported the Coalition parties when respondents were 14 years of age. 72% of Labor party supporters suggested that their fathers supported the Labor party at age 14, while 74% said their mothers were Labor supporters (Source: 1993 AES).

**Table 5.1: Four Predictor Models of Environmentalism**

Model 1	Model 2	Model 3	Model 4
Father's Class and Education	Father's Class and Education	Father's Class and Education	Father's Class and Education
Parent's Cultural Consumption	Respondent's Age	Respondent's Age	Respondent's Age
	Gender	Gender	Gender
	Value Orientations	Value Orientations	Value Orientations
	Cultural Consumption	Cultural Consumption	Cultural Consumption
	Education	Education	Education
		Respondent's Class Location	Respondent's Class Location
		Employment Sector	Employment Sector
		Urban/Rural Residence	Urban/Rural Residence
		Religiosity	Religiosity
		Ethnicity	Ethnicity
			Political Ideology
			Political Partisanship

**Aspects of environmentalism**

Having outlined the logic of the predictor models, it is necessary to discuss how environmentalism will be conceptualised. The discussion of environmentalism in Chapter 1 shows there is a diversity of meaning associated with terms such as environment, ecology, and conservation. As such, this diversity may not be captured in a single measure. I suggest that environmentalism may be conceptualised as two distinct aspects.

The notion of environmentalism includes a variety of issue-concerns (McAllister 1994, Crook and Pakulski 1995). Concern for environmental issues is understood here as an 'attitudinal' aspect. However, environmentalism also encompasses 'behavioural' aspects, such as joining an environmental group, and participating in environmental protests. The major division is therefore between concerned (attitudinal), and active (behavioural) environmentalism. This distinction is similar to that employed by Inglehart (1990b). He suggests that "[I]n moving from the realm of

attitudes toward environmentalism to the realm of pro-environmentalist behaviour, we are moving from a relatively “soft” indicator that contains a large component of spur of the moment response to a relatively “hard” indicator that refers to specific activities one either has, or has not, done” (Inglehart 1990b:54-56).

Environmentalism may also be conceptualised in terms of level of inclusiveness. Highly inclusive concepts denote a wide range of objects, such as environmental issues, groups, networks, green political parties, and activists, both local and national/global in scope. Less inclusive concepts denote a more narrow range of objects. For example, members of a Victorian branch of the Wilderness Society fall under the environmental rubric, yet the objects (members) denoted by such a description are much more specific.

I classify environmentalism on two dimensions. Firstly, according to the aspect of environmentalism (‘attitudinal’ and ‘behavioural’), and second, on level of inclusiveness as high or low. It is argued here that a range of measures are necessary to encompass ‘attitudinal’ and ‘behavioural’ aspects of environmentalism, and their various levels of inclusiveness.

Thus, six aspects of environmentalism are employed in this research: i) environmental issue concerns, ii) approval of environmental groups, iii) feelings toward environmentalists (activists), iv) *potential* membership of environmental groups, v) *actual* environmental group membership, and vi) participation in environmental protests and demonstrations (Table 5.2).<sup>2</sup>

The environmental issues, approval of environmental groups, and environmentalist feelings are all ‘attitudinal’ aspects. They measure the respondent’s attitudes toward certain aspects of environmentalism. Environmental issues are very general aspects of environmentalism, and highly inclusive. Approval of environmental groups is less inclusive than environmental issues, as it measures attitudes toward actual environmental groups. Feelings toward environmentalists is the least inclusive ‘attitudinal aspect’. It measures attitudes toward ‘environmentalists’

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<sup>2</sup> Variable construction is discussed in detail below.

- a group respondents may associate with radical activism. Activists comprise a relatively small percentage of the population, and as such they are a less inclusive aspect of environmentalism than environmental groups.

The 'behavioural' aspects of environmentalism are also differentiated according to level of inclusiveness. Potential membership is an aspect of environmentalism with a relatively high level of inclusiveness. It is more closely related to the 'behavioural' than the 'attitudinal' type. It is related to an act, joining, as opposed to an attitudinal response such as 'how do you feel about...?', or 'do you approve or disapprove of...?'<sup>3</sup> Actual membership is a much more exclusive category than potential members (sympathisers). It requires little commitment to environmentalism to consider joining, but considerably more to actually join an environmental group. Joining environmental groups, and participating in environmental demonstrations are obviously 'behavioural' aspects. However, participation in demonstrations is a less inclusive form of environmentalism than joining an environmental group. Participation in environmental demonstrations is environmental activism, and as such differs from membership in two important ways. First, not all members of environmental groups are environmental activists, or have active roles in environmental groups (Milbrath 1984:73). The level of participation of many group members in Australia is limited to subscribing to environmental organisations such as the Wilderness Society or the Australian Conservation Foundation. Second, demonstrators are not necessarily members of environmental groups. Environmental activism is characterised by loose affiliations and networks of supporters and sympathisers. Many participants in such events are not formal members of environmental groups, but 'sleepers' whose level of participation changes in response to environmental 'crises'.

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<sup>3</sup> The distinction between potential and actual members is made because there may be a substantial difference between the social characteristics of these two groups. Inglehart (1990b:54-59) makes a similar distinction between actual and potential membership of environmental groups.

**Table: 5.2 Dependent Variable Types by Level of Inclusiveness**

		Attitudinal Variables	Behavioural Variables
Level of	Higher	-Environmental Issues Scale	-Potential Environmental Group Members
Inclusiveness	Lower	-Approval of Environmental Groups Scale	-Environmental Group Members
		-Environmentalism Feeling Thermometer	-Environmental Demonstrators

**Data**

Three sets of secondary data are analysed in this research. The first is the 1990 Australian Electoral Study (n=2037), a systematic random sample drawn from the Australian electoral roll in February 1990, and collected between March and July of the same year (McAllister et al 1990). The second survey is the 1993 Australian Electoral Study (AES n=3023), a stratified systematic random sample drawn from the Australian electoral rolls in February 1993, and collected between March and May 1993 (Jones et al 1993). The 1993 AES includes a weighting variable, that “adjusts the sample by State/Territory to reflect the distribution of enrolments in the population” (Jones et al 1993:IX). The number of weighted cases are n=2388. Both AES surveys are cross sectional. Some analyses also utilise the combined AES (1990 and 1993) data (n= 5060), in order to maximise the number of environmental group members.<sup>4</sup>

The third data source combines three National Social Science Surveys (NSSS) (n=1779). These are the 1989-90 Family and Changing Sex Roles (SSDA 646), 1990 Lifestyles (SSDA 647), 1993 National Social Science Survey (not yet released),

<sup>4</sup> The 1993 AES component of the combined AES data is unweighted and therefore not strictly representative of the Australian population. However, a comparison of the results of regression models fitted to weighted and unweighted 1993 AES data reveals minimal differences in the impact of social location on environmental group membership (See Appendix A Table VI).

and the 1993 International Social Survey Programme Environment (SSDA 825) (Kelley et al 1993a, Kelley et al 1993b, Kelley et al 1995, Kelley et al 1996).<sup>5</sup>

## **Operationalisation of concepts**

### ***Dependent variables***

Confronted with the conceptual diversity and stretch, and the range of meaning denoted by the term 'environmentalism', several aspects are operationalised. The dependent variables as noted above, are of two types: 'attitudinal' and 'behavioural'. The six dependent variables operationalised in this research are shown by data source in Table 5.3. Three 'attitudinal' measures are used in this research as dependent variables: a) an environmental issues scale (NSSS only); b) a scale measuring the propensity to approve of environmental groups (AES only); c) an environmentalist feeling thermometer (NSSS only).

Three behavioural variables are also operationalised. Environmental group membership is measured as: a) environmental group members; b) those who are not members but have considered joining environmental groups.<sup>6</sup> The questions relating to *actual* environmental group membership are available with all three data sets (AES 1990 and 1993, and NSSS). The 'consider joining' variable is only available with AES data.

(Table 5.3 about here)

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<sup>5</sup> The principal investigators for all NSSS datasets are Jonathan Kelley, Clive Bean, and Mariah Evans. Krzysztof Zagorski is also a principal investigator with the 1993 NSSS and International surveys.

<sup>6</sup> The AES question asks 'How likely are you to join a group campaigning to protect the environment?' Responses: a) I am already a member; b) Not a member, but have considered joining; c) Not a member and have not considered joining; d) Would never consider joining. The NSSS question asks; 'Are you a member of any group whose main aim is to preserve or protect the environment?' The responses are yes/no.

In this research, the 'consider joining' category is used as a proxy for 'potential members'. In regression models where the consider joining variable is dependent, actual environmental group members are excluded from the analysis.

The environmental issue-concern dependent variable is developed as a general measure of concerns over possible threats to the environment. The scale is constructed from questions measuring the level of concern over various types of pollution.<sup>7</sup> The results of a factor analysis show that the six environmental issues all load on a single factor (Table 5.4). A scale variable was constructed from the six issue concerns, and is highly reliable (Cronbach's alpha= 0.81). The resulting scale is the issue concern dependent variable.

(Table 5.4 about here)

A second 'attitudinal' measure is used to gauge the level of approval for environmental groups among the public.<sup>8</sup> The environmental group approval measure is less inclusive than the issues scale, as it gauges the level of approval for actual environmental groups.<sup>9</sup> The third measure is based on attitudes toward environmentalists. It is derived from the 1993 NSSS environmentalist feeling thermometer question. Respondents are asked to indicate their feelings toward environmentalists on a scale ranging from very cold or unfavourable, to very warm or favourable.<sup>10</sup> The feeling thermometer question is a less inclusive measure of

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<sup>7</sup> The scale is constructed from six questions. The first four questions are: 'In general, do you think a) air pollution caused by cars; b) air pollution caused by industry; c) nuclear power stations; d) pesticides and chemicals used in farming...are extremely dangerous to the environment; very dangerous; somewhat dangerous; not very dangerous; not dangerous at all to the environment. The remaining questions asked: a) 'In general, do you think that pollution of Australia's rivers, lakes and streams is dangerous to the environment?'; b) 'In general, do you think that a rise in the world's temperature caused by the 'greenhouse effect' is dangerous to the environment?' Response categories: Definitely true; probably true; probably not true; definitely not true.

<sup>8</sup> It is important to note that the notion of what constitutes an environmental group is not clearly defined in either the AES or NSSS. Environmental groups may vary from large organisations (eg. Greenpeace or The Wilderness Society), to small informal groups that emerge in response to localised environmental issues (eg. local residents protesting over the logging of forests or against the construction of woodchip mills).

<sup>9</sup> The approval question in the AES surveys asks, 'There are a number of groups and movements seeking public support. For each of the following groups, please say whether you approve or disapprove of them. Groups campaigning to protect the environment'. The responses were: Strongly approve; Approve; Neither; Disapprove; Strongly Disapprove. The approval dependent variable is recoded as five steps: 0=strongly disapprove 1=strongly approve.

<sup>10</sup> The feeling thermometer question asks: 'We would like to know your feelings about some of the people you hear about in the news today. You'll probably feel favourable about some people or groups and unfavourable about others. We would like you to show your feelings using this 'feeling thermometer'. You may use any number from 0 to 100 for a rating. 100 is the highest rating, for people you feel very warm of favourable about, and 0 is the lowest rating, for people you feel very

environmentalism than the approval scale, as it relates to *environmentalists* rather than environmental groups. The environmentalist feeling thermometer variable refers to a less inclusive and more clearly defined category of environmental ‘activists’.

The percentage of environmental group members differs between the three surveys (Table 5.5). It is much higher for the National Social Science Survey than the either Electoral Study. Given that all surveys are large samples, the explanation for the differences appears to lie in question construction. The NSSS question asks about ‘groups whose main aim is to preserve or protect the environment’. It is much broader in scope than the AES question, which asks about ‘groups campaigning to protect the environment’. *Campaigning* is the key word here as it implies political action. Many groups, such as localised soil conservation groups and loosely affiliated networks of environmental supporters, are not necessarily involved in campaigning, and therefore may not be captured by the more narrowly defined question in the AES questionnaire.

(Table 5.5 about here)

The third ‘behavioural’ dependent variable measures participation in protests and demonstrations relating to the environment (1993 NSSS only). It is derived from the NSSS question; ‘In the last five years, have you taken part in a protest or demonstration about an environmental issue?’<sup>11</sup>

The six dependent variables discussed above encompass a broad range of meanings associated with the term ‘environmentalism’. The environmentalist issues scale, environmentalists feelings thermometer, and participation in demonstrations variables are operationalised using National Social Science Survey data, while the environmental group approval scale, and potential environmental group members are

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strongly against. If you are neutral about particular people, neither for them nor against, you would give a rating of 50.’

<sup>11</sup> 4.5% (n=80) of the 1993 NSSS respondents indicated they had participated in a protest or demonstration.



operationalised using Australian Electoral Study data. The environmental group membership variable is available in all three sets of survey data (see Table 5.3).

### *Independent variables*

A number of independent variables are operationalised in an attempt to locate the social bases of environmentalism in Australia. The theoretical constructs these variables represent are discussed in Chapters 2 to 4. In this section, I operationalise the key social base concepts - class, generation, and status - as well as other 'minor' social base variables - religion, urban-rural location, and ethnicity. Inglehart's (1981, 1990a, 1990b) value change hypothesis is included, because of its salience as an explanation of support for new political movements, and its links with generational explanations. Cultural consumption is operationalised as an indication of lifestyle (a status variable), while political ideology (left vs right) and partisanship are also seen to be important predictors of political behaviour and attitudes.

### *New class*

There are no serious attempts to link environmentalism with the 'old' industrial classes. The best known class accounts focus on either a 'new middle class' or an altogether 'new class' as bases of environmental concerns and activism. Of particular interest here is the alleged over representation of the *new class* among supporters of environmental new politics. In this section, class models are empirically examined with the aim of choosing the most appropriate model to explain support for environmentalism in Australia. I begin by briefly restating some important theoretical debates on new class (see chapter 2).

According to 'new class' theorists, support for new politics, including environmental activism, is disproportionately drawn either from an altogether 'new' class.<sup>12</sup> Yet it is by no means universally accepted that these 'new classes' constitute

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<sup>12</sup> I will use 'new class' as a generic term to encompass both 'new class' and 'new middle class' accounts.

social groupings in any sociological sense.<sup>13</sup> Moreover, the new class is often defined principally in occupational terms, although some theorists also specify social status (for example, radical intellectuals), and public sector employment as important defining characteristics (for example, Parkin 1968:180, Kristol 1975:134, Cotgrove and Duff 1981:102-3, Mattausch 1989:221). Adding to the confusion, most new class theorists agree that tertiary education is a necessary criterion for new class membership (for example, Ladd 1978:53, McAdams 1987:27, Kriesi 1989:1086-87, Gouldner 1979:3-4, Eckersley 1989:213, Rootes 1995:225).<sup>14</sup>

I suggest that the main differences between versions of the new class is in the level of inclusiveness (Figure 5.1).<sup>15</sup> Highly inclusive formulations, such as those proposed by Dalton (1988:154), define the new (middle) class as consisting of civil servants and white collar workers. Ehrenreich and Ehrenreich's (1977, 1979) PMC is also very broad. They define the new class largely in terms of membership of 'professional and managerial' occupational categories. Gouldner (1979) paints with a relatively broad brush, as his conceptualisation of the 'new class' comprises 'technical intelligentsia', and 'humanistic intellectuals' - both defined in a rather loose and inclusive way. Parkin's (1968) 'new middle class' is more narrow, although Kristol's (1972, 1975, 1978) version is perhaps the most exclusive. He suggests that the new class consists of 'social and cultural' professionals.

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<sup>13</sup> Narrowly defined occupational categories, such as the 'social and cultural professionals' are clearly not classes, using either a Marxian or Weberian definition of the term (see Brint 1987:1507). The social articulation and political impact of these 'new' classes is critically examined in Chapter 2.

<sup>14</sup> The Ehrenreichs are an exception here, as they define the new class as professionals and managers of all education levels (Brint 1984:34).

<sup>15</sup> On the level of inclusiveness, see Brint (1984:34). I am not concerned here with ideological differences among class theorists, for example as is evident between Marxist new class accounts (for example, McAdams), and neo-conservative accounts (for example, Kristol, Ladd).

### Level of Inclusiveness of New Class Models

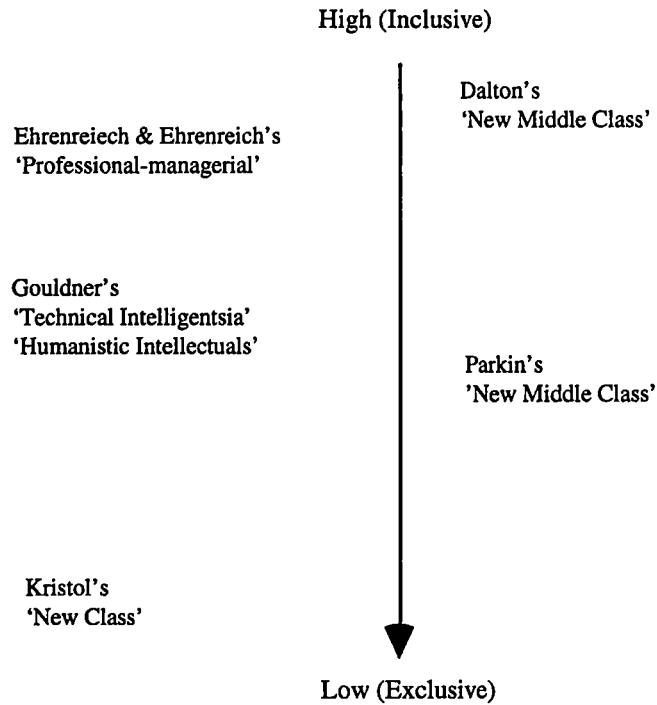


Figure 5.1

New class theorists seldom clearly circumscribe 'new class'. For example, Ehrenreich and Ehrenreich (1979:13) suggest that the boundaries separating it from other classes are 'fuzzy'. Inglehart (1990a:331) also acknowledges that "there is no clear consensus on the criteria that define the New Class". It seems that few new class theorists have any intention of empirically evaluating their class models. Some also fail to specify the relationship between the new class and other classes. For example, neither Kristol (1975), nor Ladd (1978) attempt to present a comprehensive class schema. It is therefore difficult to specify and operationalise new class models.

In order to choose a class model for analyses in the subsequent empirical chapters (6 and 7), three new class models, one 'old' class model, and a group of occupational categories are evaluated. The first new class model is based upon Ehrenreich and Ehrenreichs' (1979) 'professional and managerial' class, and is used as an example of an inclusive new class account. The original Ehrenreichs' (1979:14)

model has four classes (ruling class, old middle class, professional/managerial class, and working class).<sup>16</sup> The model operationalised here also includes a 'middle class' dummy variable, comprising non self-employed clerical and sales occupations.<sup>17</sup>

The second model is based upon Kriesi's (1989) scheme. Kriesi defines five 'new middle classes': social and cultural specialists, administrative and commercial personnel, technical specialists, craft specialists and protective services. Somewhat confusingly, he suggests the social and cultural specialists also comprise the 'new class'. Kriesi (1989:1081) examines "subdivisions within the new middle class, because the new class is generally thought to be part of the new middle class and because it is here that we expect the mobilisation potential of NSMs [new social movements, B.T.] to have its structural roots". His class scheme also includes large employers, farmers, and the old middle classes: petite bourgeois and traditional professionals. The working class are skilled workers and unskilled workers.

I break with Kriesi by placing clerical and sales employees into a separate middle class, rather than working class, again in order to maintain comparability between class models.<sup>18</sup> All manual workers (trades, semi skilled and unskilled) are coded as the working class reference category. Kriesi's 'new class' of social and cultural specialists are of particular interest as they correspond with Parkin's (1968) 'welfare and creative' occupations (Kriesi 1989:1083).

The third new class model is based upon Brint's (1984) model, and includes four new classes: managerial, technical professionals, social and cultural specialists and human services professionals. Brint's 'social and cultural specialists'

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<sup>16</sup> I divide the Professional-Managerial class into two categories on the basis of the division outlined by Ehrenreich and Ehrenreich (1979:28).

<sup>17</sup> This is primarily for reasons of consistency and comparability, as trades people, semi-skilled and unskilled workers comprise the reference category for class all models. The inclusion of the middle class variable has only minimal impact on the magnitude of the regression coefficients.

<sup>18</sup> I operationalise his five new middle classes, and his traditional professionals (medical practitioners and lawyers) but omit large employers, and the petty bourgeoisie. Due to the large number of classes specified by Kriesi (12), the number of cases in some categories (traditional professionals, protective group) is very low. The inclusion of owner classes requires the use of additional variables (employment sector, and number of employees), which further reduces the number of cases in each class category. As the interest here centred on support for environmentalism among new classes, and as the Ehrenreichs' model shows support among 'owner classes', it was decided to omit the 'owner' classes from the 'Kriesi model'. This also allows for a closer comparison to be made between the two less inclusive class models ('Brint' and 'Kriesi' models), as classes in these models are operationalised using occupational location only.

approximate Kristol's (1975) new class, which is the most exclusive new class category operationalised here. The 'technical professionals' and 'social and cultural specialists' approximate Gouldner's 'technical intelligentsia' and 'humanistic intellectuals' (see Brint 1984:36 Figure 2).<sup>19</sup> A middle class consisting of clerical and sales occupations is also included in the Brint model, with the working class (ie. trades, semi and unskilled workers) again used as the reference category. The operationalisation of these three models allows for an evaluation of arguably the most popular conceptualisations of the new class.

While the aim in this section is to choose a *class* model to be used in the analyses in the empirical chapters below, I also examine an occupational category model. Occupational groups are classified according to the Australian Standard Classification of Occupations (ASCO) major groups (Castles 1990).<sup>20</sup> The ASCO categories may be seen as proxy measures for some new classes. For example, Baker et al (1981:171), Dalton (1988:154), and Rohrschneider (1990:9) define the new middle class as white collar workers, while McAdams (1987:45) argues that support for environmental groups stems from a new class of 'professionals'.

However, as many theorists point out, classes and occupational categories are not the same. Class theorists maintain that classes may be occupationally heterogeneous but they share objective structural location and interests (the Marxian approach), or marketable skills and credentials (the Weberian approach). Yet some theorists, such as Brint (1987), suggest that the new class is little more than an occupational grouping - an additional reason for operationalising the ASCO occupational groups.<sup>21</sup>

Finally, in order to contrast new class accounts with an 'old class' model, Goldthorpe's (1982) seven class model is used. Goldthorpe's class model is operationalised for 1993 only, due to the data limitations. Although it is not a new

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<sup>19</sup> It is important to note that the social and cultural specialists identified by Brint and Kriesi differ somewhat. Brint's model is less inclusive.

<sup>20</sup> ASCO groups are "defined in terms of skill level and skill specialisation" (Castles 1990:preface).

<sup>21</sup> Brint (1987:1507), suggests the use of the term 'occsectorals' "to describe social structural locations that are narrower than 'classes' but relevant to the formation of political interests and ideals in advanced societies".

class account, and not employed in studies of environmentalism, it is included in the empirical analyses because it is an important and commonly employed model of class.<sup>22</sup>

### *Evaluation of class models*

In this evaluation of new class models, I operationalised the ASCO occupation model, the Kriesi and Brint new class models, a Marxian derived new class account (Ehrenreichs), and a neo-Weberian 'old' class model (Goldthorpe). A number of points are considered in relation to model selection. Firstly, a comparison is made between the likelihood ratio (L-square, and appropriate degrees of freedom) statistics for each class model regressed on i) the membership, and ii) the potential membership dependent variables. The L square statistics for each of the dependent variables are used to measure the respective 'goodness of fit' of each logistic regression model with the data.

The second criterion is the representativeness of the models. If a class model represents a range of theoretical classes, then it is preferable to a model that is more esoteric. Thirdly, it is important not to ignore Ockam's razor, which states; "Entities are not to be multiplied beyond necessity" (Flew 1984:253). In other words, a more parsimonious class model that provides essentially the same information as a complex one is always preferable. Finally, the predictive impact of the categories in each class model is evaluated by regressing the environmental group membership and potential membership dependent variables on each class model.

Tables 5.6 to 5.9 show the goodness of fit statistics for the Brint, Kriesi, Ehrenreichs', and Goldthorpe class models, and the ASCO occupation categories. The models are compared using three data sets; the 1990 and 1993 AES, and the 1993

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<sup>22</sup> Classes I and II are known collectively as the 'service class' (see Goldthorpe 1982, Goldthorpe and Payne 1986, Marshall et al 1988). The separation of classes I and II reflects the division between higher and lower grade professionals, administrators and managers. The intermediate class III includes routine non-manual employees in administration and commerce, and personal service workers; class IV comprises small proprietors with and without employees, and farmers, V are lower grade technicians and supervisors of manual workers; VI are skilled manual workers and VII comprises semi-skilled manual workers and agricultural workers. Class VII is used as the reference category for regression.

NSSS. The results in Table 5.6 suggest that the Brint and Kriesi models for 1990 show a very similar fit. Although the Kriesi model shows a larger likelihood ratio (L-square) than the Brint model, the difference is not significant (L-square 5.56 for 2 degrees of freedom,  $p>0.05$ ). On the other hand, the ASCO, Brint and Goldthorpe models clearly show a better fit with the 1993 data than the Ehrenreich model. Table 5.7 also indicates the similarity between the Brint and Kriesi models with the NSSS data.<sup>23</sup> The Kriesi model shows a marginally better fit than the ASCO model (L-square 7.41 for 2 degrees of freedom;  $p<0.05$ ), but is not significantly better than the Brint model (L-square 5.87 for 2 degrees of freedom;  $p>0.05$ ).

The results for potential membership show that the Kriesi model is not superior to the ASCO or Brint models at the ninety five per cent significance level (Table 5.8). For three extra degrees of freedom it only increases the fit by 5.76 likelihood ratio units ( $p<0.1$ ). The ASCO and Brint models are clearly superior to the Ehrenreich and Goldthorpe models with the 1993 AES data. The results for the demonstration dependent variable (Table 5.9) show that neither the Brint, Kriesi nor ASCO models show a significant fit with the data.

The Brint and Kriesi show a virtually identical fit on all dependent variables adjusting for degrees of freedom. They are marginally better than the ASCO model with the NSSS data, although the ASCO model returns better goodness of fit statistics for the 1993 AES data than all class models, and is comparable to the Brint and Kriesi models for the analyses of the 1990 AES.

(Tables 5.6 to 5.9 about here)

On the 'representativeness' criterion, the Brint model is preferred as it is an approximation of Gouldner's (1979) 'technical intelligentsia' and 'humanistic intellectuals' (represented by Brint's technical and human services professionals respectively), and Kristol's (1975) new class (Brint's social and cultural

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<sup>23</sup> Data limitations prevent the operationalisation of the Ehrenreich and Goldthorpe class models for the NSSS data.

professionals). Kriesi's social and cultural professionals category is much broader than Brint's. Kriesi (1989:1083) suggests his 'social and cultural specialists', "roughly correspond to Brint's 'human services professionals' and 'social and cultural specialists' ". The Ehrenreich and Ehrenreich class model differs from both the Brint and Kriesi models in an important respect. Where the latter are derived from the accounts of Gouldner, Parkin and Kristol, and as such represent more than one new class account, the Ehrenreich's model is derived from an original theoretical formulation and is therefore less representative. Goldthorpe's (1982) class model does not represent a new class.

The Brint and Ehrenreich models with six categories are more parsimonious than the nine category Kriesi model (twelve categories in its original form), and the seven (or in its expanded form, twelve) category Goldthorpe model.<sup>24</sup>

Analyses of all class models as predictors of environmental group membership and potential membership (see Appendix A Tables I-V), show that new class categories return stronger effects than other class categories for all new class models.<sup>25</sup> The results for the ASCO models lend weight to the notion that support for environmentalism is stronger among professionals than other occupational groups. Similarly, the Ehrenreichs' 'professional-managerial class(es)', and Goldthorpe's 'service class' (which includes professionals) also produce relatively strong predictive effects in their respective models. However, the most narrowly defined new class, the 'social and cultural professionals' (the Brint model), returns the strongest effects on membership and potential membership. On the basis of these preliminary findings, the Brint model is considered the best predictive new class model, on both dependent variables.

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<sup>24</sup> The number of categories mentioned includes the reference category of workers for each model. The Kriesi model as operationalised here has nine class, although for the membership dependent variables for the 1990 AES and 1993 NSSS, only eight categories are operationalised (see Tables 5.6 and 5.7). The protective group is omitted for membership, as there were no protective category respondents among members for the 1990 AES or NSSS.

<sup>25</sup> The exception was the traditional professionals for the Kriesi model. The traditional professionals returned the strongest effects of any class as a predictor of environmental group membership in 1990 (odds ratio statistics: forty-two times more likely to join an environmental group than workers). However, the very low number of traditional professionals who were also members of environmental groups (n=3), casts doubt upon this finding.



Finally, it must be remembered that data limitations impact upon model selection.<sup>26</sup> Differences in the method of classifying occupations between the surveys influences the operationalisation of new class models. As seen above, some 'classes' are very narrowly defined (for example social and cultural specialists, traditional professionals), requiring selection to the level of occupations, or ASCO unit groups. However, it is not possible to operationalise classes at the unit group level using the 1993 AES data. The models constructed using the 1993 AES data therefore group together some occupations that are separate in the original class theories upon which they are based.

Because the Kriesi model requires finer distinctions to be made between occupations (necessitating coding at the ASCO unit group level), it is operationalised using 1990 AES data and 1993 NSSS data only. On the other hand, the Ehrenreich model is operationalised using only 1993 AES data, due to difficulties with operationalising 'owner' classes.<sup>27</sup> The Brint model may be operationalised for all three samples, and is therefore favoured on this count.<sup>28</sup>

On balance, the Brint model is preferred over other the models evaluated here. It is superior, or comparable to the other models on almost all criteria. It produces approximately similar likelihood ratio statistics to the Kriesi model on the membership dependent variable, uses less degrees of freedom, and is superior to the other class models on all dependent variables. The Brint model approximates a larger number of new class constructs, yet is also the most parsimonious of all models. It may also be

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<sup>26</sup> Occupations are classified in the Australian Electoral Studies (AES) and National Social Science Surveys (NSSS) according to the Australian Standard Coding of Occupations (ASCO), but they are classified in different ways for the two AES surveys. In the 1990 AES and the NSSS, occupations are classified at the ASCO 'unit group' level. An example is medical practitioners. However, in the 1993 AES, occupations are classified at the more general 'minor group' level. In this instance, medical practitioners are grouped under the ASCO minor group, 'Health Diagnosis and Treatment Professionals', along with dentists, pharmacists, occupational therapists, optometrists, physiotherapists, chiropractors, veterinarians, and so on.

<sup>27</sup> Where the operationalisation of class models requires that owners be distinguished from non-owners (for example with the Ehrenreichs' model and Goldthorpe's 'old' class model) proxy indicators of ownership are used. The AES surveys lack data on the net worth of businesses, so self employment, and the number of employees employed by the self employed are used to distinguish 'owner' classes from non-owners. The 1990 AES does not contain a question on the number of employees employed by the self employed, which prevents large owners being distinguished from small owners. Class models that include 'owner' classes are therefore operationalised for 1993 only.

<sup>28</sup> The Brint classes are coded to the unit group level using the 1990 AES data, and 1993 NSSS data, while they are classified at the minor group level with the 1993 AES data.

operationalised using both Australian Electoral Study and National Social Science Survey data for 1990 and 1993. The Brint model is therefore chosen as *the* new class model for the empirical chapters that follow.

### *Public sector employment*

Some theorists suggest that public sector employment is an important aspect of new class location (for example Parkin 1968:180, Cotgrove and Duff 1981:102-3, Mattausch 1989:221). Milbrath (1984:77) suggests that “persons in the production sector tend to value material goods more highly whereas persons in the service sector tend to value a clean environment more highly”. Cotgrove (1982:95) also maintains that “environmentalism is an expression of the interests of those whose class position in the ‘non-productive’ sector locates them at the periphery of the institutions and processes of industrial capitalist societies...It is a protest against alienation from the processes of decision making, and the depoliticisation of issues through the usurpation of policy decisions by the experts, operating within the dominant economic values”. As public sector location is associated with new class location, and has been found to be a predictor of environmental support, it is operationalised as a dichotomous variable in the analysis below.<sup>29</sup>

### *Generations, cohorts, and age models*

The problematic nature of attempts to separate generational and life cycle effects using cross sectional data is widely recognised.<sup>30</sup> However, in this context it may be possible to distinguish between them. A gradual decline in support for environmentalism with age tends to suggest the presence of a *life cycle* effect. As people age they become slightly less supportive of environmentalism. On the other hand, generational or cohort effects should show more abrupt changes in patterns of support from one generation (or cohort) to the next.

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<sup>29</sup> Public sector employment comprises federal, state, and local government employees. The reference category for regression analysis consists of privately employed, family business or farm, and self employed.

<sup>30</sup> The use of longitudinal survey data analysis is perhaps the only reliable method of evaluating generational versus life cycle effects.

In order to measure age effects, five age models comprising one generational, three cohort models, and a continuous age variable are used as predictors of environmentalism.<sup>31</sup> The generation model should show differences in support for environmentalism between pre war and post war generations. It is based upon popular notions of the postwar 'baby-boomers' (1946-1959), and the later generation known as 'generation X' (1960+).<sup>32</sup> The third generation consists of those born before the end of World War II (1945 or earlier).

Two further cohort models are derived from recent studies of environmentalism. The first model consists of ten year cohorts, a procedure commonly employed in empirical analyses of environmentalism (for example, Inglehart 1981:886; Burklin 1985:472; Papadakis 1993:159; McAllister 1994:32). The second model uses the fifteen year cohorts employed by Inglehart (1990b:61). These two cohort models are termed 'ten year cohorts' and 'Inglehart's 15 year cohorts' respectively.

Finally, a 'decade' model is used. This is not a cohort model, but measures age in decades. Therefore, when comparisons are made between 'decade' groups with the AES data, the birth years of these 'decade' groups are not the same, but refer to respondents belonging to a certain age group at the time of the survey.<sup>33</sup> It is suggested here that if support for environmentalism is related to age, it may be better encapsulated by a model that measures age in decades. Measuring age in this way may more effectively highlight the changes that occur over the course of the life cycle. Attaining a certain age is often associated with life cycle changes (for example, increased responsibilities during the twenties after the more carefree teenage years, the onset of middle age during the forties), and crossing the threshold of a new decade in

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<sup>31</sup> The four models are operationalised using the following age groupings: Model 1: three generations (pre WWII; baby boomers 1946-1959; generation X 1960-1972/75); Model 2: 15 year cohorts (birth years: 1900-1920, 1921-35, 1936-50, 1951-65, 1966-72); Model 3: 10 year cohorts (1900-1925, 1926-35, 1936-45, 1946-55, 1956-65, 1966-72); Model 4: 'decade' groups (aged 18-19, 20-29, 30-39, 40-49, 50-59, 60-69, 70+).

<sup>32</sup> Such popular conceptions of the notion of generations are often found in the mass media. An example may be found in *The Australian Magazine*, February, 26-27, 1994.

<sup>33</sup> By 'cohort', I mean a group whose birth years are fixed, for example, those born in the years 1961-1970. This group would be aged 20 to 29 years at the time of the 1990 AES survey. They would also comprise a 'decade' group for the 1990 survey. However, a similar 'decade' group for the 1993 survey (aged 20-29), would have been born between 1964-1973, and belong to a different, although cross cutting cohort.

age is sometimes accompanied by behavioural changes (for example, retiring at sixty). If age based support for environmentalism reflects life cycle changes rather than generational effects, 'decade cohorts' may more effectively capture these effects.

Results of a preliminary evaluation of the cohort models suggest that the 'Inglehart fifteen year cohorts' and the generational model tend to mask differences in age effects. This is perhaps due to the fact that by combining groups of respondents whose birth years span relatively large periods of time, some generational and/or period effects are subsumed. The 'Inglehart fifteen year cohorts' and the generation model tend to show a decline in support with age, whereas the 'decade' and 'ten year cohort' models operationalised for the same dependent variables, more clearly highlight age based differences in support for environmentalism.

In the empirical chapters below, age is initially operationalised in regression models as a continuous measure in years. A significant linear effect suggests a life cycle effect. In addition, generational and cohort models are used in an attempt to determine the pattern of age based support.

### *Status*

Previous research into the social characteristics of environmental supporters shows an over-representation of 'radical intellectuals' and generally tertiary educated people among members and supporters of environmental groups (Parkin 1968, Van Liere and Dunlap 1980, Milbrath 1984, Porrit and Winner 1988, Rootes 1995). It is suggested in Chapter 4 that 'intellectuals' form a distinct status group, and that members of such status groups are highly likely to join environmental groups in Australia.<sup>34</sup> Post secondary education serves as a proxy indicator of this 'intellectual' social status.<sup>35</sup>

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<sup>34</sup> As a point of clarification, it is not being argued here that environmentalists *comprise* a distinct status group, but that support for environmental issues and groups is stronger among members a certain status group - the intellectuals.

<sup>35</sup> Tertiary education is operationalised as degree (bachelor degree, postgraduate diploma and higher degree), and diploma (under graduate and associate diploma) with the AES data. Degrees are also subdivided into higher degree (PhD and Master), postgraduate diploma and bachelor degree with AES data. The reference group comprises professional and trade qualifications, and those with no post secondary qualifications. For the NSSS, post secondary education is categorised from the years of education

### *Lifestyle and consumption*

Weber's (1968:305-6) notion of status group based on distinctive lifestyle is a useful concept for an examination of support for environmentalism.<sup>36</sup> Weber (1968:937) argues that status groups are "stratified according to the principles of their *consumption* of goods as represented by special styles of life".<sup>37</sup> It is suggested that members of different lifestyle groups exhibit differential levels of cultural consumption. This notion of cultural consumption is also linked to Bourdieu's (1984) analysis of taste. Bourdieu (1984:16) maintains that tastes cultures are associated with level of education and cultural capital.<sup>38</sup> Turner (1988:66) contends that lifestyle is conceptually more closely related to status groups, as style of life is based upon consumption patterns rather than production-related class position. Cultural consumption is also an indicator of an 'intellectual' status group (see Chapter 4).

Lifestyle is operationalised as two scales that measure parent's cultural consumption when respondent's were aged fourteen, and respondents' cultural consumption at age fourteen. Using maximum likelihood factoring with oblique (Harris-Kaiser) rotation, I found that cultural consumption questions load on two factors (Tables 5.10 and 5.11), similar to the two dimensions of cultural consumption ('beaux arts' and 'scholastic literature') identified by Crook (1996). However, due to the fact that the 'arts' and 'literature' dimensions are highly correlated (parents' cultural consumption inter-factor correlation= 0.60; adolescent's =0.49) they are combined in order to avoid high multicollinearity in the regression models.<sup>39</sup> The

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question as degree (15 or more years); some tertiary (13-14 years); no tertiary (the reference category of those with 12 years or less).

<sup>36</sup> Weber's notion of *Stände* is discussed in detail in Chapter 4.

<sup>37</sup> In fact, in a later work, Bourdieu (1992:237) also acknowledges the link between lifestyle and Weber's *Stand*. See chapter 4 for a detailed discussion of status and lifestyle.

<sup>38</sup> Although Bourdieu (1984:16) links 'legitimate', 'middle brow', and 'popular' tastes to the upper, middle, and working *classes* respectively, these types of cultural capital are more closely related to status groups than classes.

<sup>39</sup> The parent's cultural consumption scale comprises the following items: Attendance at art museums and galleries, history museums, classical concerts, theatre, ballet, read serious novels or poetry, science mathematics or technical books, histories or biographies, and the number of serious books and practical books owned. The scale is highly reliable, Cronbach's Alpha= 0.82. The adolescent cultural consumption scale items are: attendance at art museums and galleries, classical concerts, theatre, ballet, read serious novels or poetry, read science, mathematics or technical books, read history or biographies. Cronbach's Alpha coefficient= 0.74. As a rule of thumb for scale

combined scales were tested for reliability using Cronbach's Alpha coefficients and found to be highly reliable (parents cultural consumption Alpha= 0.82; adolescents cultural consumption Alpha= 0.74).

(Tables 5.10 and 5.11 about here)

#### *Other 'social structural' variables*

In addition to the predictor variables discussed above, a number of other 'social base' variables are included. These include gender, religion, ethnicity, and urban-rural residence. Dalton (1994:155-116) suggests that "Women are socialised into nurturing roles that lead them to be more sympathetic to environmental issues and the New Environmental Paradigm". There is also empirical evidence to suggest that women are more likely to support environmental movements than men (see Milbrath 1984:75; for Australian results see McAllister 1994:30-31), although earlier studies returned mixed results (see Van Liere and Dunlap 1980:185-186).

Religious cleavages may impact upon support for environmentalism (Inglehart 1990a). It is hypothesised that those without any religious ties are more likely to support environmental groups than the religiously affiliated. A 'No religion/religion' dichotomous variable is included.<sup>40</sup> It is also possible that there are ethnic differences in the support base of environmentalism. A dichotomous variable distinguishing those born in English speaking countries other than Australia is therefore included.<sup>41</sup> Finally, as previous studies find support for new social movements is higher in large

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construction, variables with factor loadings of less than 0.45 are excluded. As the parental and adolescent cultural consumption scales are highly correlated (Pearson's  $r=0.44$ ), parental cultural consumption is removed from predictor Models 2-4, (see Table 5.1)

<sup>40</sup> The dummy variable represents those with no ties to a religious denomination or organisation. All other religious groups comprise the reference category.

<sup>41</sup> The English speaking countries are England, Scotland, the Republic of Ireland, Northern Ireland, Canada, Malta and the United States of America. New Zealand is not included in this group, as it has close links with Australia.

cities (Kriesi 1989:1108, Papadakis 1989:85, Van Liere and Dunlap 1980:184, Dunleavy 1980), the urban/rural distinction is operationalised.<sup>42</sup>

### *Other non-structural variables*

#### *Value orientations*

As mentioned above and in chapter 4, value orientations have been linked to generational change. Researchers such as Inglehart (1981, 1990a), and Inglehart and Abramson (1992, 1994), maintain that differences in political preferences and behaviour are due to shifting value priorities linked with generational replacement.<sup>43</sup> Inglehart suggests that younger generations tend to be more postmaterialist, and concerned with quality of life issues such as environmentalism. Older generations tend to hold materialist values, and are more concerned with issues such as economic and national security. Inglehart (1981, 1990a) suggests that support for environmentalism is particularly strong among younger people who hold postmaterialist value orientations, while older materialists are under-represented among environmental group members and supporters.

In order to account for the impact of value orientations, Inglehart's (1977, 1990a) four item value orientation battery is operationalised (see Chapter 4). Inglehart's values index is operationalised both as a scale variable, and as dummy variables representing postmaterialists and materialists respectively.<sup>44</sup>

#### *Political orientation*

Given the salience of the left-right dimension in political sociology and political science, and the fact that previous research suggests that environmental supporters are

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<sup>42</sup> Variables are included for urban and suburban location. Urban location represents those living in 'inner metropolitan' areas (1993 AES) and 'big cities' (1993 NSSS). Rural residents comprise the reference category.

<sup>43</sup> Although, even Inglehart (1990b:62), in his study of support for new social movements, tentatively concluded that the differential support by generations which remained after controlling for the impact of value orientations, political orientations, religiosity, and cognitive mobilisation, may have been due to life cycle effects.

<sup>44</sup> The value orientation scale is coded 0=materialists; 0.5=mixed; 1=postmaterialists. Dummy variables are also constructed for some regression analyses as a) materialists, b) postmaterialists (those with mixed value orientations comprise the reference category).

over represented among the politically 'left' (Inglehart 1990b, Kitschelt and Hellemans 1990), the left-right political ideology dimension is also included in the following analyses.<sup>45</sup> There is also evidence of a linkage between environmentalism and political party support in Australia (Doyle 1989, Marks and Bean 1992, McAllister and Studlar 1993, Papadakis 1993, 1994, McAllister and Vowles 1994, Bean and Papadakis 1995, McAllister and Studlar 1995), and as the 'Michigan Model' implies that party identification influences partisan's political attitudes (Campbell et al 1960, Miller 1976), political party identification variables are included.<sup>46</sup> However, while it is argued above that the formation of political partisanship is prior to joining environmental groups, this may not apply to 'Other party' partisans. Given that these 'new politics' parties (Australian Democrats and Greens) are recent arrivals on the political stage, the development of a new party identification is not clearly prior to environmental participation or sympathy. The causal relationship between environmental support and new party partisanship is therefore less clear than for ALP and Coalition partisans.

## Methods

Bivariate and multivariate results are reported. Bivariate analyses are used to provide an initial understanding of the relationship between two variables. Percentages derived from crosstabulations, mean scores, and the results of correlation analysis are reported.<sup>47</sup> However, in order to more rigorously examine the relationship between dependent and independent variables, multivariate analyses are conducted.

Regression analysis is the main multivariate technique used in this research. Ordinary Least Squares (OLS) regression analysis is an appropriate technique for the analysis of the 'attitudinal' continuous scale dependent variables (Lewis-Beck 1980).

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<sup>45</sup> A scale variable measures the self identified left-right dimension (ten steps: far right=0; far left=1) for AES 1990 and 1993 only.

<sup>46</sup> Partisanship is operationalised as Other party (Australian Democrat, Greens, and other), Australian Labor Party, and Coalition (reference group for regression analyses consisting of Liberal and National parties).

<sup>47</sup> Pearson's correlations for the dependent variables and all variables in Models 1-4 are reported in Appendix D.



Regression estimates (b's), standardise regression estimates (betas) and significance levels are reported for the OLS models. Sheaf coefficients are also reported for OLS regression. They provide a means of summarising the effects of a number of independent variables in a single measure (Hiese 1972, Kelley and McAllister 1985, Whitt 1986, Bean 1991, Graetz and McAllister 1994).<sup>48</sup> The size of the sheaf coefficient for a conceptual 'block' of independent variables may be compared with other sheaf coefficients or variable estimates.<sup>49</sup> Sheaf coefficients are reported in standardised form, as they have no natural metric (Bean 1991:280). Therefore, for comparative purposes, sheaf coefficients may only be compared with the standardised regression estimates of other independent variables.

Unlike the 'attitudinal' dependent variables, the 'membership', and 'demonstrators' dependent variables are dichotomous, while the 'consider' joining variable is treated as a dichotomous variable for the purposes of this research. The analysis of dichotomous dependent variables with OLS regression is inappropriate (Aldrich and Nelson 1984). Therefore, logistic regression is employed for the analysis of 'behavioural' dependent variables. Parameter estimates, odds ratios, and L-squared statistics, are reported for logistic regression.<sup>50</sup> Percentage effects at the grand mean of the dependent variable are also reported for some logistic models. Percentages at the grand mean may be interpreted in a similar manner to OLS regression estimates (see Petersen 1984, Jones and McAllister 1989). 'Percentage of

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<sup>48</sup> Sheaf coefficients are calculated "by multiplying the unstandardised regression coefficient for each variable in the group by the variable's value for each individual case, summing the results for each case, and then re-estimating the equation with the new variable. The resulting standardised regression coefficient is the sheaf coefficient. The sheaf variable can be thought of as an "average" score for the set of variables, taking account of each variable's impact on the dependent variable" (Bean 1991:280).

<sup>49</sup> For example, a sheaf estimate for a block of class categories may be compared with (beta) estimates for an age scale variable. Such a comparison provides an indication of the relative strength of class versus age effects.

<sup>50</sup> Odds ratios are likelihood ratios calculated by taking the exponential of the logistic regression coefficient. For example, in a logistic regression model, a dummy variable representing women produces a logistic coefficient of 1 as a predictor of joining an environmental group. The odds ratio for the logistic coefficient of 1 is:  $\exp(\text{estimate})=2.72$ . The interpretation of the results are as follows; women are approximately three times more likely than men (the reference category) to join an environmental group.

The likelihood ratio ( $L^2$ ) is the value of  $-2 \times \log$  likelihood difference between the null model (with no predictor variables) and the full model (including all predictor variables).  $L^2$  is a statistic with a chi square distribution when the sample size is large. It provides a means to gauge the fit of the model.

the null model fitted' statistics are also reported. These approximate R-squared statistics in OLS regression (see Marks and Bean 1992).<sup>51</sup>

Factor analysis is also used in this research, primarily for the purpose of identifying dimensionality in a number of measures, and the construction of scale variables (see above). Maximum likelihood factoring with varimax or Harris-Kaiser oblique rotation is used to estimate factor loadings (see Kim and Mueller 1978). The reliability of scales is tested using Cronbach's Alpha coefficients (see Cronbach 1951).

Missing values are coded to their respective mean score, in the case of continuous variables, and to the mode for dummy variables. For ease of interpretation and comparison, all continuous variables (including the dependent variables) are scaled to range from zero to one with the exception of age (years), and father's education in years (NSSS only).<sup>52</sup>

In this chapter, the selection and construction of dependent variables measuring various aspects of environmentalism is explained, and some preliminary analyses are conducted. The approach of adding 'blocks' of independent variables in a temporal order to represent social location and other explanatory accounts are also discussed. In the following chapters the dependent variables are regressed upon the predictor models in order to explain the social bases of 'attitudinal' (Chapter 6) and 'behavioural' (Chapter 7) aspects of environmentalism in Australia.

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<sup>51</sup> The 'percentage of the null model fitted' are calculated:  $L^2 / -2 * \text{Log Likelihood for the null model}$ .

<sup>52</sup> See Appendix C for variable scoring, means and standard deviations.

**Table 5.3 ‘Attitudinal’ and ‘Behavioural’ Dependent Variables by Survey Source**

	AES 1990	AES 1993	NSSS 1993
<b>‘Attitudinal’ Dependent Variables</b>			
1 Environmental Issue-concern (Scale)			√
2 Approval of Environmental Groups (Scale)	√	√	
3 Environmentalist Feeling Thermometer			√
<b>‘Behavioural’ Dependent Variables</b>			
4 Potential Environmental Group Membership	√	√	
5 Environmental Group Membership	√	√	√
6 Participation in Environmental Demonstrations			√

**Table 5.4: Factor Estimates for Environmental Issue Concerns.**

Issue Concern	Factor Loadings	Cronbach’s Alpha (with item deleted)
Air pollution caused by cars	.56	.80
Nuclear Power Stations	.57	.81
Air pollution caused by industry	.76	.76
Pesticides used in farming	.70	.77
Pollution of rivers, lakes, and streams	.70	.78
Rise in World temperature caused by Greenhouse effect	.67	.78
Scale		.81

Notes: N=1779.  
Factor estimates were calculated using Maximum Likelihood method.  
Percentage of variance explained by one factor 0.44

Source: Combined National Social Science Surveys 1993

**Table 5.5: Percentages of Respondents Indicating they are Environmental Group Members in AES and NSSF.**

	AES 1990	AES 1993	NSSF 1993
Members of Environmental Groups	2.9 (58)	4.5 (135)	9.7 (170)
Have Considered Joining	21.5 (428)	18.1 (541)	-
Not Considered Joining	59.9 (1195)	51.5 (1544)	-
Would Never Join	15.7 (314)	25.9 (776)	-
Not a Member	-	-	90.3 (1590)
Missing	(42)	(27)	(19)
N	(2037)	(3023)	(1779)

Sources: 1990 & 1993 Australian Electoral Studies; Combined National Social Science Surveys 1993.

**Table 5.6: Goodness of Fit Statistics for Class Models for Membership of Environmental Groups (AES).**

	ASCO	Brint	Kriesi	ASCO	Brint	Ehrenreichs	Goldthorpe
	1990	1990	1990	1993	1993	1993	1993
Null Model	527.15	527.15	527.15	872.99	872.99	872.99	872.99
Full Model	500.93	497.72	492.16	814.10	817.60	833.95	819.40
L-square	26.21	29.42	34.98	58.89	55.39	39.04	53.59
df	5	5	7	5	5	5	5
Dependent Variable N	(58)	(58)	(58)	(135)	(135)	(135)	(135)
Total N	(2037)	(2037)	(2037)	(2388)	(2388)	(2388)	(2388)

Sources: 1990 and 1993 Australian Electoral Studies.

**Table 5.7: Goodness of Fit Statistics for Class Models for Membership of Environmental Groups (NSSS).**

	ASCO	Brint	Kriesi
Null Model	1121.53	1121.53	1121.53
Full Model	1100.98	1099.44	1093.56
L-square	20.55	22.09	27.96
df	5	5	7
Dependent Var N	(170)	(170)	(170)
Total N	(1779)	(1779)	(1779)

Source: Combined National Social Science Surveys 1993 .

**Table 5.8: Goodness of Fit Statistics for Class Models for Potential Environmental Group Members (AES).**

	ASCO	Brint	Kriesi	ASCO	Brint	Ehrenreichs	Goldthorpe
	1990	1990	1990	1993	1993	1993	1993
Null Model	2066.65	2066.65	2066.65	2260.69	2260.69	2260.69	2260.69
Full Model	2019.81	2018.76	2013.00	2215.77	2217.87	2233.13	2229.85
L-square	47.47	47.89	53.65	44.91	42.82	27.56	30.84
df	5	5	8	5	5	5	5
Dependent Variable N	(428)	(428)	(428)	(541)	(541)	(541)	(541)
Total N	(1979)	(1979)	(1979)	(2888)	(2888)	(2888)	(2888)

Notes: Dependent variables a) Members of environmental groups; b) Not members but have considered joining environmental groups. Members are excluded from the analysis of b.

Sources: 1990 & 1993 Australian Electoral Studies.

**Table 5.9: Goodness of Fit Statistics for Class Models for Environmental Demonstrators (NSSS).**

	ASCO	Bunt	Kriesi
Null Model	652.63	652.63	652.63
Full Model	646.40	643.89	644.37
L-square	6.22	8.73	8.25
df	5	5	7
p	ns	ns	ns
Dependent Var N	(170)	(170)	(170)
Total N	(1779)	(1779)	(1779)

Source: Combined National Social Science Surveys 1993 .

**Table 5.10: Factor Estimates for Parents Cultural Consumption**

	Factor 1	Factor 2
Attending Art Museums	0.68	0.04
Attending History Museums	0.63	0.06
Attending Classical Concerts	0.69	-0.00
Attending Theatre	0.64	-0.03
Attending Ballet	0.68	-0.09
Attending Library	0.28	0.37
Read Practical Books	-0.09	0.61
Read Serious Novel or Poetry	0.03	0.70
Read Science, Mathematics, Technical Books	-0.06	0.79
Read History or Biographies	-0.00	0.84
Number of serious and practical books owned	0.16	0.54

N=1779.

Notes: Factor estimates are calculated using Maximum Likelihood factoring with Oblique (Harris-Kaiser) rotation.  
Variance explained by Factor one 0.37; Factor two 0.09.  
Kaiser's Sampling Adequacy 0.87  
Correlation between two factors 0.60

**Table 5.11: Factor Estimates for Adolescent Cultural Consumption**

	Factor 1	Factor 2
Attending Art Museums	0.60	0.06
Attending Classical Concerts	0.65	-0.05
Attending Theatre	0.61	-0.01
Attending Ballet	0.66	-0.10
Attending History Museums	0.44	0.20
Read History or Biographies	-0.02	0.84
Read Science, Mathematics, Technical Books	-0.14	0.84
Read Serious Novel or Poetry Books	0.18	0.59
Read Practical Books	0.05	0.43
Number of serious and practical books owned	0.18	0.40
Attending Library	0.26	0.42

N=1779

Notes: Factor estimates are calculated using Maximum Likelihood factoring with Oblique (Harris-Kaiser) rotation.  
Variance explained by Factor one 0.31, Factor two 0.09.  
Kaiser's Sampling Adequacy 0.84.  
Correlation between factors 0.49.

Source: National Social Science Survey 1993

## Chapter 6

### **‘Attitudinal’ Aspects of Environmentalism**

The social bases of the ‘attitudinal’ aspects of environmentalism are examined empirically in this chapter. In order to achieve this, three ‘attitudinal’ measures are employed, an environmental issues scale, a variable measuring feelings toward environmentalists, and an approval of environmental groups measure. The aims of this chapter are threefold: first, to assess empirically the theoretical claims relating to the social location of environmentalism in Australia; second, to evaluate the relative explanatory power of competing social base explanations; and finally, to discuss the relative impact of social location explanations on different dependent variables. I begin with a brief discussion of the relevant dependent and independent variables, and the models and analytical techniques that are used.

The issues and feelings dependent variables are operationalised using 1993 National Social Science Survey (NSSS) data, while the environmental groups approval scales are derived from the 1990 and 1993 Australian Electoral Studies (AES). The dependent variables used in this chapter are all ordinal level variables, and as such Ordinary Least Squares (OLS) regression analysis is an appropriate multivariate technique (Lewis-Beck 1980).

The dependent variables are regressed on ‘blocks’ of independent variables that are introduced into the regression equation in a temporal order to measure the impact of a) social background, b) adolescent socialisation, c) present social location, and d) political orientation on environmentalism.<sup>1</sup> The social background model variables (Model 1) include respondents’ fathers social class location when respondents were aged 14 (using the Brint class model), father’s education in years (NSSS only), and parent’s cultural consumption at respondent’s age 14 (NSSS only). Model 2 adds

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<sup>1</sup> The dependent and independent variables are discussed in detail in Chapter 5.



respondent's age in years,<sup>2</sup> gender, value orientations (Inglehart 4 item battery scale), post secondary education, and respondent's cultural consumption at age 14 (NSSS only), to the variables in Model 1. Model 3 adds respondent's present social location variables, consisting of class location (Brint class model), employment sector, residential location (1993 AES and 1993 NSSS only), religious denomination, and country of birth (English speaking countries other than Australia) to Model 2. The fourth and final model adds political orientation variables: political ideology measured on a self identified left-right scale (10 steps: 0-10 for AES only), and political party identification variables.

The relative explanatory strength of the predictor variables may be understood by comparing the regression coefficients (b's), sensitive to differences in the metric of measurement, and the standardised regression coefficients (betas) for each variable. Sheaf coefficients are also calculated, and are used to gauge the impact of a group of independent variables on the dependent variable. They provide a means of comparing the relative effect of blocks of predictor variables with the effects of other predictor variables. Sheaf coefficients are reported in standardised form, as they have no natural metric, and can only be meaningfully compared with the standardised coefficients of other independent variables (Bean 1991). The percentage of variance in the dependent variable explained by the predictor variables (R-square) is also reported for each regression model. The R-square statistics provide a measure of how much variance in the dependent variable is accounted for by the independent variables. In other words, they gauge how well the predictor models 'explain' the dependent variable.

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<sup>2</sup> The impact of generational and cohort effects on environmental support is discussed in greater detail below.

## Results

Before analysing the social bases of environmentalism using multivariate techniques, bivariate analyses are conducted. Mean scores are reported for the independent variables on each dependent variables (Table 6.1). The dependent and independent variables range between zero and one. The results show that respondent's class location is an important indicator of environmentalism. Social and cultural professionals and human services professionals, in particular, show higher mean scores for all dependent variables. Respondents whose fathers were social and cultural or human services professionals also exhibit higher environmentalism scores. Another new class indicator - public sector employment - also leads to higher levels of environmental support.

The 'decade' age group results show that respondents older than the 40-49 group tend to produce mean scores below the sample means. Younger groups produce higher mean scores, with teenagers producing by far the highest. The magnitude of the mean scores tends to decrease with age, although the 20-29 group for the 1990 and 1993 Australian Electoral Studies (AES) are both marginally lower than the 30-39 group.

Higher education leads to increased support for environmentalism. There is also a gender effect, with women returning higher mean scores on all dependent variables than men. Postmaterialists are consistently more sympathetic to environmentalism, as are those indicating a left political stance, or an 'other' or ALP party affiliation. The secular are more environmentally sympathetic than the religious, and those living in urban locations score higher on environmental dependent variables than rural dwellers. Respondents born in English speaking countries other than Australia also score slightly higher on the approval of environmental groups variable.

Overall, the pattern emerging from the bivariate analysis is consistent with the findings of previous research. There is a tendency for environmental support to be higher among younger, well educated, urban, postmaterialist, leftwing people

employed in new class professions. In the following sections, multivariate analysis is employed in order to establish the net impact of each of the independent variables on the dependent variables. Multivariate analysis provides a means of ascertaining the relative importance of each of predictor of environmentalism.

(Table 6.1 about here)

### ***Environmental issues***

In this analysis of environmental issues, 'blocks' of independent variables are added in a temporal order to represent social background, adolescent socialisation, present social location, and political orientation effects (Models 1-4 respectively). The results presented in Table 6.2 indicate that the impact of social background effects on the environmental issue scale is minimal. The percentage of variance explained in the dependent variable is very low ( $R^2=0.005$ ). Father's education, and parent's cultural consumption are not significant, while father's class location only produces three weak negative effects. Children of technical professionals are three per cent less likely than manual workers to support environmental issues. The children of managers and those from middle class locations return similar results.

The percentage of variance explained improves considerably with the addition of adolescent socialisation variables (Model 2:  $R^2=0.05$ ).<sup>3</sup> The weak effects for father's class location remain. In addition, age in years, gender, cultural consumption at age 14, and years of education all produce statistically significant results.

The analyses show that younger people are slightly more likely than older people to be concerned about environmental issues. The effect of age is modest, (0.03 units change for a thirty year age difference), but highly significant ( $p<0.001$ ). The effect for gender is moderately strong ( $\beta=0.15$ ). Women score approximately five units higher on the environmental issues scale. Respondents who were consumers of high culture during adolescence are significantly more likely than non-

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<sup>3</sup> The parent's and adolescent's cultural consumption variables are highly correlated ( $r=0.47$ ). In order to avoid problems of high multicollinearity the parent's cultural consumption variable is removed from the analysis for Models 2-4.

consumers to be concerned about environmental issues ( $b = 0.06$ ). Yet surprisingly, education shows no significant results.<sup>4</sup>

The third predictive model adds respondents' present social location variables (class location, government sector employment, religious affiliation, and country of birth), and allows an evaluation to be made of the relative impact of the 'social base' explanations of environmentalism.

Once again, the increased R-square statistic ( $R^2 = 0.06$ ) indicates an improved model fit, although the magnitude of the regression coefficients for social location variables are very modest. New class location is not a significant predictor of environmental issue support, with the exception of technical professionals, who are slightly less concerned about the environment than manual workers ( $b = -0.02$ ). Managers are also four per cent less likely than manual workers to be concerned about the environment. Employment in government sector occupations is not a significant predictor. On the other hand, the non-religious are slightly more likely to be concerned about the environment than those indicating a religious affiliation ( $b = 0.02$ ).

The fourth model adds political party identification. This variable is an important predictor as indicated by a four percentage points increase in the R-square statistics ( $R^2 = 0.10$ ).

Support for environmental issues is found among those identifying with 'other' political parties ( $b = 0.09$ ). Australian Labor Party (ALP) partisans are also more likely to support environmental issues than supporters of the Coalition ( $b = 0.06$ ). In fact, when the relative magnitude of the standardised regression coefficients and sheaf coefficients for all predictor variables are compared, party identification shows the largest effect (sheaf = 0.20). The next largest estimates are produced for gender (beta = 0.15), age (beta = -0.09), and father's and respondent's class location (sheaf = 0.07).

[Table 6.2 about here]

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<sup>4</sup> The weakness of the education effects are not due to the inclusion of cultural consumption at age 14. When the cultural consumption variable is removed from the regression equation, the estimates for the education variables are almost unchanged (see Appendix B Tables XII and XIII).

### *Environmentalist feeling thermometer*

The environmentalist feeling thermometer dependent variable is now regressed on the four predictor models (Table 6.3). Although parent's cultural consumption does not produce significant results, there are some social background effects present in Model 1, namely, father's education and class location which emerge as significant although modest predictors of favourable feelings towards environmentalists. Each additional year of father's education gives a small increase in the likelihood of respondents having favourable attitudes toward environmentalists ( $b = 0.004$ ). Children of fathers from new class locations are more likely than manual workers to look favourably upon environmentalists, although the impact of father's class location as a whole is modest (sheaf = 0.08).

When the adolescent socialisation model variables are added (Model 2), the social background variables no longer return significant results, with the exception of manager fathers ( $p > 0.05$ ). Yet all of the variables added in Model 2 show significant effects for environmental feelings, with the exception of respondent's holding degrees. The percentage of variance in the dependent variable explained by the model also improves (Model 1:  $R^2 = 0.01$ ; Model 2:  $R^2 = 0.04$ ).

A moderate to strong gender effect is apparent. Women score approximately five percentage points higher than men on the feelings thermometer measure ( $\beta = 0.12$ ). The effect of adolescent cultural consumption ( $\beta = 0.08$ ), age ( $\beta = -0.07$ ), and value orientations ( $\beta = 0.04$ ) are weaker.

With the addition of respondent's social location variables in Model 3, a number of variables show significant results. Respondent's class location has a significant impact upon feelings toward environmentalists. Social and cultural ( $b = 0.09$ ) and human services professionals ( $b = 0.07$ ) are more likely to have favourable feelings toward environmentalists than manual workers. Managers on the other hand are less supportive ( $b = -0.04$ ). Religion is also a significant predictor, with the secular more likely than the religious to have positive feelings toward environmentalists ( $b = 0.05$ ),

while people living in large cities and their suburbs are more likely than those in rural locations to feel warmly about environmentalists. A comparison of the beta coefficients for Model 3 suggest that respondent's class location (sheaf= 0.13) and gender (beta= 0.10) produce the largest coefficients, controlling for the impact of all other predictor variables.

The addition of the political party identification variables in Model 4 have a minimal impact on the magnitude of other predictor variables. However, the party identification variables show strong effects on the environmentalist feeling thermometer. With a sheaf coefficient of 0.25, party identification is a far stronger predictor of pro-environmentalist feelings than class location (sheaf= 0.12), gender (beta= 0.11), religiosity (beta= 0.06) and adolescent cultural consumption (beta= 0.06). A substantial increase of six percentage points for the R-square statistics from 0.06 for Model 3, to 0.12 for Model 4, confirms the importance of political party identification as a predictor of pro-environmentalist attitudes.

[Table 6.3 about here]

### ***Approval of environmental groups***

In this section the social bases of environmentalism are examined using a dependent variable that measures the propensity to approve of environmental groups (Tables 6.4 to 6.5). The approval question is included in both the 1990 and 1993 Australian Electoral Studies (AES), allowing comparisons to be made between the results of the two surveys. The models are slightly different to those used in the analysis of the National Social Science Survey (NSSS), as the cultural consumption and father's education questions are not available for the AES. However, the self identified political ideology scale is available with the AES so that both political ideology and partisanship are included in Model 4. The models also differ slightly between the AES surveys, because residential location is unavailable in 1990.<sup>5</sup>

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<sup>5</sup> Occupations were also coded in a different manner in the Electoral Studies of 1990 and 1993, resulting in a slightly different operationalisation of classes (see Chapter 5 for details).

The results show that father's class location has little impact on environmental group approval in 1990, as only the manager group are significantly less approving than respondents whose fathers were manual workers ( $b = -0.03$ ). In 1993 the effect of father's class location is stronger, with the human services and technical professionals more approving of environmental groups. Once again managerial background shows a similar result, although the magnitude of the effects are small. The impact of social background on approval of environmental groups is very weak, as it explains only a very low percentage of the variance (1990:  $R^2 = 0.002$ ; 1993:  $R^2 = 0.007$ ).

The addition of age, gender, value orientation, and education in Model 2 increases the percentage of variance explained substantially for both surveys (1990:  $R^2 = 0.04$ ; 1993:  $R^2 = 0.04$ ). Age and value orientations both have a moderate influence, with younger, postmaterialists more likely to approve of environmental groups. Women score two to three percentage points higher than men on the approval measure, and respondents with degrees are more likely than those without a tertiary education to approve of environmental groups. On the other hand, diplomates do not show a significant difference in support from the non-tertiary educated.

The addition of the adolescent socialisation variables in Model 2 renders the effect of father's new class insignificant for 1993, although a weak effect for fathers who were managers is apparent in both surveys. Age has the strongest impact of all Model 2 variables for 1990 ( $\beta = -0.16$ ), followed by value orientations ( $\beta = 0.08$ ), while for 1993 the relative predictive effect of age and value orientation is similar (age:  $\beta = -0.11$ ; value orientation:  $\beta = 0.12$ ). The impact of age seems to have declined from 1990 to 1993, while the value orientations effect has strengthened. It is also interesting to note that moderate sized estimates exist for both age *and* value orientations.<sup>6</sup>

All of the present social location variables introduced in Model 3 return significant results on environmental group approval. Class effects are evident, and

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<sup>6</sup> The relationship between age and value orientations is discussed in detail below.

while the results for the new class differs somewhat between the AES surveys, the total impact of class measured by the sheaf coefficients is similar (1990: 0.08; 1993: 0.09).<sup>7</sup> Social and cultural professionals are seven per cent more likely than manual workers to approve of environmental groups in 1990. However, in 1993 these differences are not apparent, while human services professionals are on average five percentage points higher on the approval scale than manual workers. Managers exhibit slightly lower levels of approval in both 1990 and 1993.

As is the case with the issues and feeling thermometer dependent variables discussed above, government sector employment produces no statistically significant results for approval of environmental groups. However, the no-religion variable is a significant correlate of approval for environmental groups (1990:  $b = 0.05$ ; 1993:  $b = 0.03$ ). In 1993 respondents living in urban ( $b = 0.04$ ) and suburban ( $b = 0.03$ ) areas are also slightly more likely to approve of environmental groups than rural respondents, and those born in English speaking countries are slightly more likely to approve than those born in Australia or other countries ( $p > 0.05$ ). Country of birth has no significant effect in 1990.

The introduction of the political ideology variables in Model 4 comprises the full model.<sup>8</sup> The percentage of variance explained rises quite dramatically with the addition of the political ideology and political party identification variables (1990:  $R^2 = 0.09$ ; 1993:  $R^2 = 0.09$ ). It is also important to note that the effects of adolescent socialisation and present social location variables remain relatively stable with the inclusion of the two political variables.

Respondents who identify themselves as ideologically 'left', are more likely to approve of environmental groups than 'right' identifiers. This result holds for both surveys, although the effect of political ideology is slightly weaker in 1993 (1990:  $b = 0.08$ ; 1993:  $b = 0.06$ ). Party identification also proves to be an important predictor

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<sup>7</sup> The differences in the level of new class support for 1990 and 1993 may to some extent reflect the slightly different manner in which classes are coded (see Chapter 5).

<sup>8</sup> Self-identified political orientation and political party identification are not highly correlated (AES 1990:  $r = 0.29$ ; AES 1993:  $r = 0.31$ ), so high multicollinearity is not a problem when these variables are both included as predictors in regression models.



of environmental group approval for both surveys, with 'other' party (1990:  $b=0.12$ ; 1993  $b=0.11$ ) and ALP supporters (1990:  $b=0.08$ ; 1993  $b=0.08$ ) significantly more likely to approve of environmental groups than supporters of the Coalition parties. It is interesting that the impact of some social location variables - age, gender, value orientations - decrease with the addition of the political ideology variables in Model 4, while new class effects increase slightly.

A comparison of the standardised regression coefficients for each predictor variable or group of variables provides a method of ascertaining their relative explanatory power. The strongest influence on environmental group approval for both surveys is political party identification (1990: sheaf= 0.19; 1993: sheaf= 0.18). Age is the next most important effect in 1990 ( $\beta = -0.11$ ), while respondent's class location (sheaf= 0.08) is stronger than political ideology ( $\beta = 0.07$ ), and value orientation ( $\beta = 0.07$ ). In 1993 value orientation ( $\beta = 0.10$ ) and age ( $\beta = -0.09$ ) rank next to party identification in magnitude, followed by social class location (sheaf= 0.08).

[Tables 6.4 and 6.5 about here]

The analyses so far show that most social base variables are relatively poor predictors of environmental support, especially when compared with non-social base effects such as political partisanship. There are also some surprises when the relative impact of social base variables are considered. The impact of class location is weaker than both gender and age for the issues variable. It is also less important than age as an indicator of environmental group approval. Only on the feeling thermometer does class emerge as marginally more important than age, a somewhat surprising result in view of the plethora of theories advocating that environmental support stems from the new class. Given the importance of age, at least its relative importance in relation to other social base effects, its impact on environmental support is examined in greater detail in the next section.

### *Generation and cohort effects*

Age, generations and cohorts figure prominently in discussions of environmentalism. As discussed in Chapter 3, support for environmentalism is often higher among young people. These claims find some support in the analyses above, with age proving to be a relatively important predictor of environmental issues and approval compared with other social location variables.

In this section I employ a number of generation and cohort models to explore the age base further. Estimates for 'attitudinal' measures of environmentalism regressed upon the generation, cohort and age models are shown in Table 6.6. The models control for the impact of all other 'social base' variables (ie. Model 3: background+adolescent socialisation+social location).<sup>9</sup>

It is apparent that the two postwar generations ('generation X' and 'baby boomers') are more likely to be concerned about environmental issues and to approve of environmental groups than the generation born before World War II. However, the differences between the estimates for the two postwar generations are minimal. This suggests that the major differences in age based environmental support is between not three, but two generations - pre and postwar.<sup>10</sup>

The same dependent variables regressed upon the 'fifteen year' cohorts show a somewhat different picture of environmental support. Again there is little difference in the size of the regression coefficients. However, with the exception of cohorts 2 and 3 that produce similar estimates, the results show a steady decline in support with age on the issues and approval scales.<sup>11</sup>

The 'ten year' cohort model illustrates the nature of age based support for these two dependent variables in more detail. It shows that environmental support is high

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<sup>9</sup> The age effect was much weaker for the environmentalist feeling thermometer dependent variable. Therefore, further analysis of this dependent variable with generation and cohort models was not conducted.

<sup>10</sup> This possibility is examined further in Chapter 7.

<sup>11</sup> The '15 year' cohorts are based upon those who were: 18-24, 25-39, 40-54, 55-69, and 70 plus in 1990. The same birth years are carried through to 1993, so that the cohorts are comparable. Cohort 1 represents those who were 18-20 (born 1973-75) in 1993, and therefore too young to be included in the 1990 electoral studies. The same logic applies to Cohort 1 for the '10 year' cohort model.

for Cohort 1, steady for Cohorts 2 and 3, and then declines for Cohort 4 (born after the end of World War II). A slight decline in the strength of the age effects is also evident *across the samples* for approval of environmental groups, among Cohorts 2-3 for the '15 year' model, and for Cohorts 2-4 with the '10 year' model. This may indicate that environmental support declines as people age. However, the changes in the magnitude of the estimates are very slight, and for Cohort 5, for both cohort models, the age effect actually increases from 1990 to 1993. Further, there are only three years separating the two AES surveys. An extended series of survey data is necessary to establish the existence of a clear trend.

The 'decade' model uses age groups (groups with the same age range for each survey) rather than cohorts (those with the same birth years across the surveys ). It includes teenage respondents as a separate category, and provides for a somewhat different operationalisation of age for the two Australian Electoral Studies. Teenagers return by far the largest regression coefficients for approval of environmental groups.<sup>12</sup> Age based support then drops dramatically, but remains stable for the 20-29 and 30-39 groups (although it is slightly stronger among the 30-39 group in 1990). Support then decreases again suddenly among the 40-49 and older categories. The issues variable regressed upon the 'decade' groups shows a more steady decline in age based support.

Apart from modest differences between the pre and postwar generations, the results tend to suggest that support for environmentalism declines with age (in line with a life cycle interpretation), rather than changes abruptly from one generation (or cohort) to the next. Nevertheless, these are tentative conclusions. A definitive answer to the life cycle versus generational controversy requires longitudinal research.

[Table 6.6 about here]

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<sup>12</sup> There were no teenage respondents in the 1993 NSSS, the youngest respondents were aged 22 years. It should also be noted that there are very few teenagers in either AES survey (1990 n=19; 1993 n=26) so the reliability of the results for the teenage cohorts are questionable.

## Discussion

I now specifically address the questions posed at the beginning of the chapter: What are the social bases of environmentalism? What is the relative explanatory impact of 'social base' explanations on environmentalism? Does the explanatory power of social base explanations differ according to different aspects of environmentalism?

In order to address these questions, the impact of the independent variables on the three dependent variables are rank ordered, and summarised in Table 6.7.<sup>13</sup> The strength of the effects of independent variables in regression equations involving different dependent variables are not directly comparable. However, it is possible to discuss the *relative* strength of predictor effects by comparing the rank order of the standardised regression coefficients and sheaf coefficients on each dependent variable.

[Table 6.7 about here]

It is perhaps appropriate to begin this discussion by examining the impact of class location. Although there is some variation across the dependent variables, respondent's class location ranks consistently high as a predictor of environmentalism compared to other 'social base' variables. It ranks second on the environmentalist feeling thermometer, third on the approval scale for 1990 and fourth for the 1993 approval and environmental issues scales. Father's class location has a rather moderate impact upon the feeling thermometer and environmental issues scale, although it does have an indirect effect upon environmental support as seen above. However, it must be stressed at the outset that class is only important *relative* to other social location effects. In general, the impact of (new) class location is *very weak*.

Some suggest that the political impact of social class in advanced Western societies is low. The results presented above support this contention, although they indicate that class location has some impact upon support for environmental new

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<sup>13</sup> Rank ordering is conducted by comparing the magnitude of the standardised regression coefficients and sheaf coefficients for each independent variable (or group of variables) on the dependent variables.

politics. Location in the so called 'new class', especially among the social and cultural and human services categories produces the largest class effects on environmental dependent variables, lending *some* support to the hypotheses of a number of new class theorists (for example, Parkin 1968, Gouldner 1979, Kristol 1975, 1978).

Other versions of new class theory are not supported by the results.

Government sector employment - another element of new class location - is a very poor predictor of environmentalism. It does not have a significant impact on any dependent variable. This suggests that there is little support in the Australian case for theories that link new class membership with public sector employment (for example, Parkin 1968, Kristol 1975, 1978, Offe 1985, McAdams 1987, Mattausch 1989).

The rank order results suggest that respondent's age is approximately equal in magnitude to class location as an explanator of the 'attitudinal' dependent variables. Age ranks second and third as a predictor of the environmental group approval scales, and third on the environmental issues scale, although it is a relatively less important predictor for the feeling thermometer. Overall, however, the impact of age as a predictor of environmental support is only moderate. There is also little evidence to suggest that environmental support is strongly differentiated according to generations. However, *some* generational effects are detected. The post World War II generation, for example, is more supportive of environmentalism than the pre war generation.

Although the impact of age is only moderate, it is interesting for another reason. Age results persist, even controlling for the impact of social background, adolescent socialisation, social location and political ideology. Younger people are more likely to support environmentalism for reasons other than that they are more postmaterialist, leftwing and more highly educated than their older counterparts. One possible explanation for this is the recent increase in environmental coverage in the media and education curricula. These changes may affect lifestyle choices, as young people are socialised to place greater value on the environment than their predecessors. Another possibility is that some type of life cycle effect is occurring. Due to increased apathy

or cynicism, people may become less concerned about idealistic issues such as the environment as they age.

Value orientation has a moderate effect on approval for environmental groups, especially in 1993, but has little impact of the environmentalist feeling thermometer and environmental issues scales. In general, Inglehart's claims regarding postmaterialist support for environmentalism are supported, but the impact of value orientations are weaker than might be expected.

Gender has a relatively strong effect on the environmental issues scale and environmentalist feeling thermometer, although it is weaker for the approval variables. Nevertheless, on the basis of these results, women are consistently more supportive of environmentalism than men. The remaining 'social base' variables produce weaker and/or inconsistent effects on all dependent variables. The impact of education is notably weak. The lack of strong educational effects suggest that (achieved) status is not an important predictor of environmentalism. Further, the education results do not confirm the prime position attributed to higher education by theorists such as Eckersley (1989) and Rootes (1995). To an extent the effect of education is controlled for by other social location effects, such as class and age. Yet the bivariate results show that level of education does not differentiate environmental support to a large extent. A more sensitive measure of education might reveal greater differences, although perhaps the weak education results reflect an increased awareness and appreciation of environmental concerns across the social spectrum.

Partisanship exerts the strongest effect on environmental support. It shows by far the largest (sheaf) effects for all dependent variables. The partisanship effects are also stable for both 1990 and 1993, which does not support the contention that 'the environment' was a more highly politicised issue during the 1990 federal election. It seems that attitudes relating to the environment are more closely linked with the 'political' than the 'social'. On the other hand, political orientation is a relatively poor indicator of environmental support, and its impact decreases slightly from 1990 to

1993. This may reflect a decline in the utility of the left-right cleavage for explaining 'attitudinal' aspects of environmentalism, at least in the Australian case.

Perhaps the most important and consistent finding is that social location explains only a small percentage of the variance on all three 'attitudinal' dependent variables. The weak social location effects indicate that environmentalism may have become a 'mainstream' political issue. Indeed, recent surveys and public opinion polls seem to confirm this. Yet while attitudes toward the environment are weakly located socially due to their 'mainstream' nature, it does not necessarily follow that the social base of environmental activism should exhibit a similar pattern. In order to examine the pattern of support for 'behavioural' aspects of environmentalism, I analyse environmental group membership, potential membership, and participation in environmental demonstrations in the next chapter.

**Table 6.1: Mean Scores for Independent Variables by Dependent Variables**

	Environmental ist Issues Scale	Environment -alist Feeling Thermometer	N	Environmental Group Approval	N	Environmental Group Approval	N
	1993 (NSSS)	1993 (NSSS)		1990 (AES)		1993 (AES)	
<b>Father's Class</b>							
Social and Cultural	.67	.63	(42)	.75	(55)	.78	(42)
Human Services	.68	.51	(38)	.74	(43)	.77	(128)
Technical	.67	.58	(150)	.74	(96)	.78	(168)
Managers	.66	.51	(432)	.70	(492)	.70	(664)
Middle Class	.67	.53	(279)	.75	(226)	.74	(286)
Workers	.69	.54	(686)	.73	(985)	.73	(1314)
<b>Respondents Class</b>							
Social and Cultural	.71	.63	(65)	.80	(60)	.82	(62)
Human Services	.71	.63	(181)	.75	(156)	.80	(278)
Technical	.66	.54	(171)	.75	(148)	.75	(202)
Managers	.63	.47	(187)	.67	(230)	.68	(341)
Middle Class	.69	.55	(470)	.74	(583)	.73	(816)
Workers	.68	.52	(380)	.71	(597)	.72	(844)
<b>'Decades'</b>							
18-19	-	-	-	.84	(19)	.86	(26)
20-29	.71	.59	(168)	.76	(330)	.76	(297)
30-39	.70	.57	(349)	.77	(463)	.78	(518)
40-49	.69	.54	(421)	.73	(410)	.74	(638)
50-59	.66	.51	(313)	.69	(286)	.72	(521)
60-69	.66	.52	(282)	.67	(296)	.70	(513)
70 plus	.65	.52	(213)	.66	(191)	.67	(396)
<b>Post Secondary Education</b>							
Degree	.68	.57	(309)	.78	(207)	.78	(381)
Diploma	.69	.58	(141)	.74	(201)	.75	(245)
Other	-	-	-	.72	(575)	.74	(982)
None	.68	.53	(1304)	.71	(961)	.71	(1281)
<b>Gender</b>							
Male	.66	.51	(909)	.71	(984)	.72	(1451)
Female	.71	.57	(866)	.74	(1034)	.74	(1515)
<b>Value Orientations</b>							
Postmaterialist	.70	.59	(229)	.79	(258)	.80	(419)
Materialist	.67	.53	(260)	.70	(508)	.69	(629)
Mixed	.68	.53	(955)	.73	(1213)	.72	(1959)
<b>Employment Sector</b>							
Public	.69	.56	(450)	.74	(509)	.74	(800)
Other	.66	.51	(707)	.72	(1279)	.72	(1709)
<b>Residential Location</b>							
Urban	.70	.56	(203)	-	-	.75	(996)
Suburban	.68	.55	(1236)	-	-	.74	(797)
Rural	.68	.50	(324)			.70	(1213)
<b>Religious Denomination</b>							
No Religion	.70	.59	(412)	.79	(259)	.77	(428)
Religion	.67	.52	(1125)	.71	(1723)	.72	(2521)
<b>Country of Birth</b>							
English Speaking Countries	-	-	-	.74	(194)	.75	(341)
Australia, NZ and Others	-	-	-	.72	(1818)	.73	(2633)
<b>Political Ideology</b>							
Left	-	-	-	.82	(281)	.79	(448)
Centre	-	-	-	.73	(893)	.73	(1265)
Right	-	-	-	.69	(613)	.69	(803)
<b>Political Party Identification</b>							
Coalition	.64	.47	(733)	.66	(818)	.67	(1250)
Other	.75	.65	(89)	.83	(145)	.82	(89)
ALP	.71	.60	(778)	.77	(914)	.78	(1301)
<b>Dependent Means</b>	.68	.54	(1779)	.72	(2037)	.73	(2388)

Notes: For NSSS, Diploma category represents some tertiary education, while other post secondary education, country of birth and political ideology are not available. The youngest respondents in the NSSS are aged 22. Residential location is not available for the 1990 AES. 1993 AES mean scores are calculated using weighted data (n=2388). Weighted 'N's are not reported as they are not produced by the SAS proc means procedure. Political ideology is coded: Left = 1-4, Centre = 5-6, Right = 7-10.

Sources: 1990 and 1993 Australian Electoral Studies; 1993 National Social Science Survey



**Table 6.2: OLS Regression Estimates for Predictors of Environmental Issues Scale (NSSS 1993).**

	Model 1	Model 2	Model 3	Model 4
<b>Intercept</b>	0.67	0.70	0.70	0.66
<b>Social Background</b>				
Father's Education	0.001 (0.04)	0.001 (0.02)	0.00 (0.01)	0.00 (0.01)
Father's Class (Sheaf)	0.09	0.09	0.09	0.07
Social	-0.04 (-0.04)	-0.04 (-0.04)	-0.04 (-0.04)	-0.04 (-0.04)
Human Services	-0.02 (-0.02)	-0.02 (-0.02)	-0.03 (-0.02)	-0.02 (-0.02)
Technical	-0.03* (-0.05)	-0.03** (-0.05)	-0.03** (-0.05)	-0.03** (-0.05)
Manager	-0.03** (-0.08)	-0.03** (-0.07)	-0.03** (-0.07)	-0.02* (-0.05)
Middle Class	-0.03** (-0.06)	-0.03** (-0.06)	-0.02** (-0.06)	-0.02** (-0.05)
Parents Culture	0.01 (0.01)	-	-	-
<b>Adolescent Socialisation</b>				
Age		-0.001*** (-0.12)	-0.001*** (-0.10)	-0.001*** (-0.09)
Female		0.05*** (0.15)	0.04*** (0.14)	0.05*** (0.15)
Value Orientation		0.03 (0.04)	0.02 (0.04)	0.02 (0.04)
Culture (at age 14)		0.06** (0.06)	0.06** (0.06)	0.05** (0.05)
Education (Sheaf)		0.03	0.05	0.05
Degree		-0.01 (-0.03)	-0.02* (-0.05)	-0.02* (-0.05)
Some Tertiary		0.01 (0.01)	0.00 (0.01)	0.00 (0.00)
<b>Present Social Location</b>				
Class (sheaf)	-	-	0.10	0.07
Social & Cultural			0.02 (0.03)	0.02 (0.03)
Human Services			0.01 (0.02)	0.01 (0.03)
Technical			-0.02* (-0.04)	-0.01 (-0.03)
Manager			-0.04** (-0.08)	-0.03** (-0.05)
Middle Class			-0.01 (-0.04)	-0.01 (-0.02)
Government Sector			0.01 (0.04)	0.00 (0.01)

Table 6.2 continued

Residence (Sheaf)			0.04	0.04
Urban Location			0.02 (0.03)	0.01 (0.02)
Suburban			-0.00 (-0.01)	-0.01 (-0.03)
No Religion			0.02** (0.06)	0.01* (0.04)
Party ID (Sheaf)				0.20
Other Parties				0.09*** (0.12)
ALP				0.06*** (0.18)
R <sup>2</sup> (adjusted for df)	0.005	0.05	0.06	0.10
n	(1779)	(1779)	(1779)	(1779)

Notes: \* <0.1 \*\* P<0.05 \*\*\* P<0.001. Regression coefficients (b's) are reported with standardised coefficients (betas) shown in parenthesis. Dependent Variable is environmental issues scale (see research design chapter)  
Class: Technical Professionals: Natural scientists, engineers, surveyors, computing professionals, miscellaneous professionals (excluding librarians) mathematicians, statisticians and actuaries, other professionals, economists, accountants, public relations officers, other business professionals, technical officers (medical science, engineering, and air and sea transport), Social & Cultural Professionals. Medical practitioners and lawyers, university and CAE teachers, Artists and related professionals, education researchers, other social scientists, architects, ministers of religion; Human Services Professionals: Health Diagnosis and Treatment (excluding medical practitioners), teachers, social workers, librarians, counsellors, nurses, psychologists; Middle Class: Clerks, Sales & Personal Service Workers, Police, Miscellaneous para-professionals; Working class (reference category): Trades, Plant and Machine Operators, and Drivers; Labourers and Related Workers  
Value Orientation: 0=materialist; 0.5=mixed, 1=postmaterialist. Scale for Cultural Consumption at age 14 (see Chapter 5).  
Party Identification dummy variables: Liberal + National parties=Coalition (reference group), Australian Democrat, Green, Other=Other parties; Australian Labor Party=ALP.

Source: 1993 National Social Science Survey

**Table 6.3: OLS Regression Estimates for Predictors of Environmentalist Feeling Thermometer (NSSS 1993).**

	Model 1	Model 2	Model 3	Model 4
Intercept	0.50	0.50	0.46	0.39
<b>Social Background</b>				
Fathers Education	0.004** (0.06)	0.002 (0.03)	0.001 (0.02)	0.00 (0.02)
<b>Father's Class (Sheaf)</b>	0.08	0.08	0.07	0.06
Social	0.06* (0.04)	0.05 (0.03)	0.03 (0.02)	0.04 (0.02)
Human Services	-0.04 (-0.03)	-0.06 (-0.03)	-0.07* (-0.04)	-0.05 (-0.03)
Technical	0.04* (0.04)	0.03 (0.03)	0.02 (0.03)	-0.03 (-0.04)
Manager	-0.02 (-0.04)	-0.02* (-0.04)	-0.02 (-0.03)	-0.00 (-0.00)
Middle Class	-0.01 (-0.02)	-0.01 (-0.02)	-0.02 (-0.03)	-0.01 (-0.02)
Parents Culture	0.001 (0.009)	-	-	-
<b>Adolescent Socialisation</b>				
Age		-0.001** (-0.07)	-0.0009** (-0.06)	-0.0006* (-0.04)
Female		0.05*** (0.12)	0.05*** (0.10)	0.05*** (0.11)
Value Orientation		0.04* (0.04)	0.04* (0.04)	0.03 (0.03)
Culture (at age 14)		0.11** (0.08)	0.10** (0.07)	0.09** (0.06)
<b>Education (Sheaf)</b>		0.06	0.04	0.04
Degree		0.02 (0.03)	-0.01 (-0.02)	-0.01 (-0.02)
Some Tertiary		0.05** (0.05)	0.03 (0.03)	0.03 (0.03)
<b>Present Social Location</b>				
<b>Class (sheaf)</b>			0.13	0.12
Social			0.09** (0.07)	0.09** (0.07)
Human			0.07** (0.09)	0.08*** (0.11)
Technical			0.01 (0.01)	0.02 (0.03)
Manager			-0.04** (-0.05)	-0.01 (-0.02)
Middle Class			0.00 (0.00)	0.02 (0.03)
Government Sector			0.00 (0.00)	-0.02 (-0.03)

**Table 6.3 continued.**

<b>Residence (Sheaf)</b>			0.07	0.05
Urban Location			0.04** (0.06)	0.03 (0.04)
Suburban			0.04** (0.08)	0.03** (0.05)
No Religion			0.05*** (0.09)	0.03** (0.06)
<b>Party ID (Sheaf)</b>				0.25
Other Parties				0.14*** (0.13)
ALP				0.11*** (0.24)
<b>R<sup>2</sup> (Adjusted for df)</b>	0.01	0.04	0.06	0.12
<b>n</b>	(1779)	(1779)	(1779)	(1779)

Notes: \* <0.1 \*\* P<0.05 \*\*\* P<0.001. Regression coefficients (b's) are reported with standardised coefficients (betas) shown in parenthesis. Dependent Variable is Environmentalist Feeling Thermometer, recoded to range 0-1.  
For details of independent variables see Table 6.2 and Chapter 5.

Source: 1993 National Social Science Survey

**Table 6.4: OLS Regression Estimates for Predictors of Environmental Group Approval (AES 1990).**

	Model 1	Model 2	Model 3	Model 4
<b>Intercept</b>	0.72	0.78	0.77	0.66
<b>Social Background</b>				
<b>Father's Class (Sheaf)</b>	0.07	0.05	0.05	0.03
Social	0.02 (0.02)	-0.01 (-0.01)	-0.01 (-0.01)	-0.00 (-0.00)
Human Services	0.01 (0.01)	-0.01 (-0.00)	-0.00 (-0.00)	0.02 (0.01)
Technical	0.01 (0.01)	-0.00 (-0.00)	-0.00 (-0.00)	-0.00 (-0.01)
Manager	-0.03** (-0.05)	-0.03** (-0.05)	-0.02* (-0.04)	-0.00 (-0.01)
Middle Class	0.02 (0.03)	0.01 (0.01)	0.01 (0.01)	0.01 (0.02)
<b>Adolescent Socialisation</b>				
Age		-0.002*** (-0.16)	-0.002*** (-0.15)	-0.002*** (-0.11)
Female		0.02** (0.05)	0.02** (0.05)	0.02 (0.03)
Value Orientation		0.07*** (0.08)	0.06*** (0.08)	0.05** (0.07)
<b>Education (Sheaf)</b>		0.06	0.03	0.03
Degree		0.06** (0.06)	0.02 (0.03)	0.02 (0.02)
Diploma		0.02 (0.02)	0.01 (0.01)	0.02 (0.02)
<b>Present Social Location</b>				
<b>Class (Sheaf)</b>			0.08	0.08
Social			0.07** (0.05)	0.07* (0.05)
Human			0.02 (0.02)	0.03 (0.03)
Technical			0.02 (0.02)	0.04* (0.04)
Manager			-0.03* (-0.04)	-0.01 (-0.01)
Middle Class			0.02 (0.04)	0.03* (0.05)
Government Sector			0.00 (0.00)	-0.01 (-0.02)
No Religion			0.05*** (0.07)	0.04** (0.05)
ESC			0.03 (0.03)	0.02 (0.02)
<b>Political Orientation</b>				
Political Ideology				0.08** (0.07)
<b>Party ID (Sheaf)</b>				0.19
Other Party				0.12*** (0.13)
Labor				0.08*** (0.17)
R <sup>2</sup> (Adjusted for df)	0.002	0.04	0.05	0.09
n	(2037)	(2037)	(2037)	(2037)

Notes: \* <0.1 \*\* P<0.05 \*\*\* P<0.001

Regression coefficients (b's) are reported with standardised coefficients (betas) shown in parenthesis. Dependent variable is approval of environmental groups scale 0=strongly disapprove; 0.25=disapprove; 0.5=neither; 0.75=approve; 1=strongly approve.

For details of independent variables see Table 6.2 and Chapter 5.

ESC: English speaking country of birth. Political ideology is coded in ten steps from 0=far right to 1=far left;

Source: 1990 Australian Electoral Study

**Table 6.5: OLS Regression Estimates for Predictors of Environmental Group Approval (AES 1993).**

	Model 1	Model 2	Model 3	Model 4
<b>Intercept</b>	0.73	0.75	0.73	0.64
<b>Social Background</b>				
Father's Class (Sheaf)	0.08	0.05	0.04	0.03
Social	0.05 (0.03)	0.02 (0.01)	0.01 (0.01)	0.02 (0.01)
Human Services	0.04* (0.03)	0.02 (0.02)	0.02 (0.02)	0.02 (0.02)
Technical	0.05** (0.05)	0.02 (0.02)	0.01 (0.01)	0.02 (0.02)
Manager	-0.03** (-0.05)	-0.02** (-0.04)	-0.01 (-0.03)	-0.00 (-0.00)
Middle Class	0.01 (0.01)	-0.00 (-0.00)	-0.00 (-0.00)	0.01 (0.01)
<b>Adolescent Socialisation</b>				
Age		-0.002*** (-0.11)	-0.002*** (-0.12)	-0.001*** (-0.09)
Female		0.03** (0.06)	0.02** (0.05)	0.02** (0.05)
Value Orientation		0.10*** (0.12)	0.09*** (0.12)	0.08*** (0.10)
<b>Education (Sheaf)</b>		0.06	0.02	0.01
Degree		0.04** (0.06)	0.01 (0.02)	0.01 (0.02)
Diploma		0.02 (0.02)	-0.00 (-0.00)	0.00 (0.00)
<b>Present Social Location</b>				
<b>Class (Sheaf)</b>			0.09	0.08
Social			0.04 (0.02)	0.05 (0.03)
Human			0.05** (0.06)	0.06** (0.07)
Technical			0.00 (0.00)	0.01 (0.02)
Manager			-0.03** (-0.05)	-0.01 (-0.01)
Middle Class			-0.00 (-0.01)	0.00 (0.00)
Government Sector			0.01 (0.02)	-0.00 (-0.01)
<b>Residence (Sheaf)</b>			0.08	0.08
Urban			0.04*** (0.09)	0.04*** (0.09)
Suburban			0.03** (0.05)	0.03** (0.06)
No Religion			0.03** (0.04)	0.02 (0.02)
ESC			0.02* (0.03)	0.02 (0.02)

Table 6.5 continued.

Political Orientation

Political Ideology				0.06** (0.05)
Party ID (Sheaf)				0.18
Other Party				0.11*** (0.07)
Labor				0.08*** (0.18)
R <sup>2</sup> (Adjusted for df)	0.005	0.04	0.06	0.09
n (weighted)	(2388)	(2388)	(2388)	(2388)

Notes: \* <0.1 \*\* P<0.05 \*\*\* P<0.001  
Regression coefficients (b's) are reported with standardised coefficients (betas) shown in parenthesis. Dependent variable is approval of environmental groups scale 0=strongly disapprove; 0.25=disapprove; 0.5=neither; 0.75=approve; 1=strongly approve.  
For details of independent variables see Table 6.2 and Chapter 5.  
ESC: English speaking country of birth. Political ideology is coded in ten steps from 0=far right to 1=far left;

Source: 1993 Australian Electoral Study

**Table 6.6: OLS Regression Estimates for Age Effects on Environmental Issues, and Approval or Environmental Groups, Controlling for Social Background, Adolescent Socialisation and Present Social Location.**

	Approval 1990	Approval 1993	Issues 1993
<b>Generation Model</b>			
Generation X (1960 +)	0.07*** (0.12)	0.06*** (0.10)	0.05*** (0.11)
Baby Boomers (1946-59)	0.07*** (0.14)	0.04*** (0.08)	0.04*** (0.11)
Pre World War II (1900-45 reference)	-	-	-
<b>'15 Year' Cohort Model</b>			
Cohort 1 (1973-75)	-	0.13*** (0.07)	n/a
Cohort 2 (1966-72)	0.08*** (0.10)	0.07*** (0.08)	0.04** (0.07)
Cohort 3 (1951-65)	0.08*** (0.16)	0.07*** (0.14)	0.04** (0.12)
Cohort 4 (1936-50)	0.04** (0.08)	0.05*** (0.10)	0.01 (0.03)
Cohort 5 (1921-35)	-0.01 (0.99)	0.01 (0.02)	0.01 (0.01)
Cohort 6 (1900-20 reference)	-	-	-
<b>'10 Year' Cohort Model</b>			
Cohort 1 (1973-75)	-	0.12*** (0.07)	n/a
Cohort 2 (1966-72)	0.08*** (0.09)	0.06*** (0.08)	0.05** (0.07)
Cohort 3 (1956-65)	0.08*** (0.14)	0.08*** (0.13)	0.06*** (0.13)
Cohort 4 (1946-55)	0.06*** (0.10)	0.05*** (0.09)	0.03** (0.09)
Cohort 5 (1936-45)	0.03 (0.04)	0.04** (0.06)	0.01 (0.02)
Cohort 6 (1926-35)	-0.03 (0.97)	0.00 (0.01)	0.02 (0.04)
Cohort 7 (1900-25 reference)	-	-	-
<b>'Decade' Model</b>			
Aged (18-19)	0.15** (0.06)	0.18*** (0.07)	n/a
Aged (20-29)	0.07*** (0.11)	0.08*** (0.10)	0.07*** (0.13)
Aged (30-39)	0.09*** (0.15)	0.08*** (0.13)	0.05*** (0.13)
Aged (40-49)	0.05** (0.08)	0.06*** (0.10)	0.03** (0.09)
Aged (50-59)	0.01 (0.01)	0.04** (0.07)	0.01 (0.02)
Aged (60-69)	-0.00 (1.00)	0.02 (0.04)	0.01 (0.03)
Aged (70+ reference)	-	-	-
n	(2037)	(2388)	(1779)

Notes: Estimates control for all predictor variables in Model 3, for each dependent variable  
n/a signifies not available (in the NSSS age ranges from 22 to 93).  
Regression coefficients (b's) are reported with standardised coefficients (betas) shown in parenthesis.  
For details of independent variables see Chapter 5.

Sources: 1990 & 1993 Australian Electoral Studies; 1993 National Social Science Survey.



**Table 6.7: Rank Ordering of Importance of Environmental Predictor Variables by Dependent Variables**

	Environmental Issues Scale	Environmental Feeling Thermometer	Environmental Group Approval Scale	Environmental Group Approval Scale
	NSSS	NSSS	AES	AES
	1993	1993	1990	1993
<b>Social Base Variables</b>				
Father's Class	4	4	6	6
Father's Education	7	8	n/a	n/a
Respondent's Class	4	2	3	4
Government Employment Sector	7	7	7	8
Education	5	6	6	8
Age	3	6	2	3
Gender (Female)	2	3	6	5
Respondent's Cultural Consumption age 14	5	4	n/a	n/a
Residence	7	5	n/a	4
No Religion	6	4	5	7
English Speaking Country	n/a	n/a	7	7
<b>Other Variables</b>				
Value Orientation	6	7	4	2
Political Ideology	n/a	n/a	4	5
Political Partisanship	1	1	1	1

Note: Rank order is established by the magnitude of standardised regression coefficients and sheaf coefficients for each predictor variable or group of variables in Tables 6.2 to 6.5, Model 4. n/a = not available.

## Chapter 7

### **‘Behavioural’ Aspects of Environmentalism**

In this chapter, the social bases of ‘behavioural’ aspects of environmentalism are empirically examined. The aims here are similar to those in Chapter 6 - to assess the impact of social location on environmental activism in Australia, to establish the relative explanatory value of competing explanations outlined in Chapters 2 to 4, and to examine whether the explanatory value of social location on ‘the behavioural’ aspects of environmentalism, differs from the ‘attitudinal’ aspects discussed in Chapter 6.

Environmentalism is analysed here using the three ‘behavioural’ dependent variables which comprise: potential membership of environmental groups (AES only);<sup>1</sup> environmental group membership; and participation in environmental demonstrations in the past five years (NSSS only). These three dependent variables also measure different levels of commitment to environmentalism, ranging from low (potential membership of environmental groups) to high (participation in environmental protests).

The same four empirical models employed in Chapter 6 are again used here. However, in this chapter logistic regression is employed rather than ordinary least squares methods, since the dependent variables are dichotomous (Aldrich and Nelson 1984). The first three models are designed to evaluate social base explanations of environmentalism. These models include variables that measure phenomena that are causally prior to behaviour linked to environmental groups. The fourth model includes variables that are not unambiguously prior to joining environmental groups,

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<sup>1</sup> Potential members are derived from response b) to the AES question ‘How likely are you to join a group campaigning to protect the environment?’ Response categories: a) I am already a member; b) Not a member, but have considered joining; c) Not a member and have not considered joining; d) Would never consider joining. Environmental group members are removed from the analysis of potential members.

or participating in environmental demonstrations. However, it is argued in Chapter 5 that they are prior.

The relative importance of predictor variables are calculated in two ways. First, multivariate analysis shows the net effect for each independent variable on the dependent variables. The independent variables producing the largest effects on the dependent variable may be deemed to have the greatest explanatory impact (in this case measured in terms of logistic regression estimates, odds ratios, and percentage differences at the grand mean).<sup>2</sup> Second, I remove the independent variables from the regression equation and examine the change in model fit (Jones and McAllister 1989:11). In order to achieve this: L square statistics are calculated for the full explanatory model,<sup>3</sup> and for the full model less each independent variable, or block of independent variables. The resulting statistic is a measure of the contribution of each independent variable, or block of independent variables to the fit of the model.

## Results

Before examining the multivariate results, bivariate results are presented for the membership and participation in demonstration variables (Tables 7.1 and 7.2).<sup>4</sup> The bivariate results reveal several social location effects. New class location appears to be an important determinant of environmental group support. Nineteen per cent of social and cultural specialists and eleven per cent of technical professionals are members of environmental groups, compared to 4.5 per cent of the total sample (1993 AES). Those employed in new class professions also appear more likely to have considered joining an environmental group (potential members). Similar results emerge for the National Social Science Survey (NSSS), with new classes (social and cultural, human services and technical professionals) showing strong links with

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<sup>2</sup> Odds ratios are calculated by taking the exponential of the logistic estimate. Percentage differences at the grand mean of the dependent variable are interpretable in a similar manner to OLS regression estimates.

<sup>3</sup> L-square distributions approximate chi square values when the sample is large.

<sup>4</sup> 1990 AES bivariate results are shown in Appendix B, Table I

environmental groups. Father's new class location is also an important correlate of membership, with technical professional backgrounds particularly prominent.

Another aspect of new class location - public sector employment - returns mixed results. The NSSS results show that the publicly employed are over represented among members and demonstrators, although this is not the case for the AES. However, potential members are slightly more likely to be employed in the public sector.

Support for environmental groups gradually decreases with age. The only 'glitch' in this pattern appears with the AES results where the percentage of members in the 20-29 age-group is lower than that for the 30-39, 40-49 and 50-59 groups. Those in their thirties, forties, and surprisingly seventies and over are most likely to participate in environmental demonstrations.

The bivariate results show that those with higher education are overrepresented among the members of environmental groups, with support declining with level of education. Those with a degree (bachelor or higher degree) are more than twice as likely as the sample average to join an environmental group (AES), and are also overrepresented among potential members. There is little difference in gender support for environmental groups. Women are slightly over represented among members for the AES, although the opposite is true with the NSSS. However, women are more likely to be potential members, and much more likely to be involved in environmental demonstrations. Postmaterialists are overrepresented among members and potential members of environmental groups, and they are also much more likely to be involved in environmental protests.

Other social location effects also impact upon environmental group membership and participation in demonstrations. Those who are not aligned with a religious denomination are overrepresented among members; for the AES by more than twice the sample average. Residential location returns contradictory results for the two samples. Members are more likely to be suburban based for the AES, while rural and urban dwellers are overrepresented among membership of environmental groups in

the NSSS.<sup>5</sup> Demonstrators are less likely to live in urban locations. Environmental group members are slightly more likely to be born in English speaking countries other than Australia.<sup>6</sup>

Political ideology also impacts upon environmental support. Respondents who place themselves on the ideological 'left' are over represented among environmental groups, while those on the 'right' are far less likely to be environmentally active. People who identify with 'other parties' (ie. Australian Democrats, Greens, and others) are overrepresented among members, potential members and demonstrators. ALP supporters are also more likely than the sample average to participate in demonstrations.

The bivariate analyses indicate that social location has an impact upon environmental activism. However, it is not apparent from the bivariate analyses how much of this impact is due to inter correlations between the independent variables. In order to control for this, and to more rigorously assess the impact of social location on the 'behavioural' aspects of environmentalism, multivariate techniques are employed in the sections that follow.

[Tables 7.1 and 7.2 about here]

The multivariate results are discussed by dependent variables in an order representing different levels of commitment to environmentalism. The analysis commences with potential membership (a relatively low level of commitment), moves on to membership (a high level of commitment), and finally participation in demonstrations (the highest level of commitment). The estimates for predictor variables are net effects - those that remain after controlling for all predictor variables in each regression model.

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<sup>5</sup> Different question wording for the membership questions between the AES and NSSS may contribute to differences in membership support bases (see Chapter 5).

<sup>6</sup> The merged NSSS data does not have a suitable country of birth question.

### ***Environmental groups - potential members***

The results of analyses of potential environmental group membership are presented in Tables 7.3 and 7.4. The regression models do not include *actual members*, hence the smaller 'n's. Model 1 for 1990 and 1993 indicates that social background has a relatively strong impact upon potential environmental group membership. Respondents whose fathers were social and cultural professionals or technical professionals, are significantly more likely than those from working class backgrounds to have considered joining environmental groups in 1990 and 1993. Somewhat surprisingly, in 1990, respondents whose fathers were employed in a social and cultural profession are twenty three per cent more likely than children of manual workers to have considered joining an environmental group.

In Model 2, respondent's age in years, gender, value orientations and education are added as predictor variables. The effect of social background is somewhat diminished, controlling for the impact of the variables added in Model 2, but remains significant for respondents whose fathers were employed in social and cultural, or technical professions. Age emerges as an important indicator of potential membership. The difference in age-based support may be illustrated by calculating the likelihood that two hypothetical respondents would consider joining an environmental group. Expressed in this way, a sixty year old person would be approximately two and a half times less likely than a thirty year old to have considered joining an environmental group in 1990, but approximately *four and a half times* less likely to have considered joining in 1993.<sup>7</sup>

Women are approximately four percentage points more likely than men to have considered joining in 1990, although in 1993 there are no statistically significant differences for gender. Value orientation is an important predictor of potential environmental group membership for both surveys. At the mean of the dependent

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<sup>7</sup> The estimations for 1990 are based upon the following calculations. Where the logistic estimate for age in 1990 is -0.03, the difference between a 60 year old and a 30 year old is exponential  $((60 * -0.03) - (30 * -0.03)) =$  a probability of 0.41.  $1/0.41 = 2.46$  or almost two and a half times less likely to have considered joining.

variable, postmaterialists are over twenty six per cent more likely than materialists to have considered joining in 1990. The impact of postmaterialist values is also of a similar magnitude in 1993. In fact value orientation proves to be the strongest predictor of potential membership for both Australian Electoral Surveys.

Tertiary education has a moderate impact upon potential group membership. Respondents with degrees are seventeen percentage points more likely than those without tertiary qualifications to have considered joining an environmental group in 1990, and approximately sixteen percentage points more likely to join in 1993. In both surveys, diplomates are also likely than those without a tertiary education to be potential members.

The results for Model 3 show that new class location is a moderate predictor of potential environmental group membership. Respondents employed in human services professions are more than eleven per cent more likely than working class respondents to be potential members in 1990.<sup>8</sup> There is also a weak effect for middle class location in 1990, but no significant respondent class effects for 1993. Another indicator of new class location, government sector employment, engenders no higher propensity to join.

Religiosity also impacts upon potential membership. Secular respondents are more than fourteen per cent more likely than the religiously affiliated to be potential members of an environmental group in 1990, although this decreases substantially in 1993. Large city dwellers are also more environmentally supportive, as they are about four per cent more likely than those living in country areas to be potential members. The results for the third predictor model in Tables 7.3 and 7.4 show that even controlling for the impact of all other predictor variables, father's class location (in 1990 only), age, value orientation and tertiary education remain as significant predictors of potential environmental group membership.

Model 4 adds the political orientation variables; self-identified political ideology, and political party identification. Controlling for the impact of all other predictors,

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<sup>8</sup> The human services category approximates Gouldner's (1979), 'humanistic intellectuals'.

those who identify as far left wing are about sixteen per cent more likely than those on the far right to be potential members in 1990. This difference increases to twenty two per cent in 1993. It is noteworthy that the increased strength of political ideology from 1990 to 1993 for potential membership stands in contrast to the environmental group approval results in Chapter 6, where it decreased slightly between the two surveys.

Supporters of 'other' parties (Australian Democrats, greens and others) are much more environmentally supportive than Coalition partisans, by almost sixteen per cent in 1990. This is hardly surprising, given the proximity of the new political parties to the environment movement. However, Australian Labor Party supporters are also about eight to nine per cent more likely to consider joining than Coalition supporters. The results also indicate a slight shift in the impact of party identification. The likelihood of ALP supporters to consider joining increases slightly from 1990 to 1993, while the opposite tendency is apparent for 'other' party supporters. This trend however, is very weak.

From these results, a profile of a typical potential environmental group member may be drawn. Such a person tends to be young, postmaterialist, and highly educated. He or she is also ideologically leftwing and supports either a new politics party (Australian Democrat or Green) or the ALP. On the basis of the 1993 results, it is possible to calculate predicted probability values for such a person.<sup>9</sup> The probability that a twenty-five year old person with these characteristics will consider joining an environmental group is 0.67. In other words, approximately seven out of ten people with these characteristics are potential members. Compared with the sample percentage of potential members at 0.18 or about two in ten, the likelihood of potential membership is more than tripled for such a person.

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<sup>9</sup> Predicted probabilities are calculated using the following formula. Predicted probability =  $\frac{\text{exponential}(\text{intercept} + \text{all relevant logistic estimates})}{1 + \text{exponential}(\text{intercept} + \text{all relevant logistic estimates})}$ . In this case the calculations are based upon the 1993 Model 4 results for a 25 year old postmaterialist with a degree, who is left wing and an 'other' party supporter. This is calculated as follows;  $\exp(-1.99 + [25 * -0.03] + 1.10 + 0.75 + [0.8 * 1.09] + 0.73) = 2.03$ .  $2.03 / 3.03 = 0.67$ . Age estimate of  $25 * -0.03 = -0.75$ , represents 25 years multiplied by the age estimate of -0.03. The political ideology estimate is derived as follows:  $0.8 * 1.09 = 0.87$ , where 0.8 represents 'left' on the political ideology scale ranging 0-1, and 1.09 is the logistic estimate.



The impact of social location on potential environmental group membership is generally weak. Social class effects are almost conspicuous by their absence, with the exception of a modest new class result for 1990. In fact, age emerges as having the most important social location effect on this 'behavioural' dependent variable, as it does for the 'attitudinal' variables.<sup>10</sup>

[Table 7.3 and 7.4 about here]

### ***Environmental groups - membership***

Potential membership is one thing, but to actually join an environmental group indicates a substantially higher level of commitment to environmentalism. The social bases of environmental group *membership* are now examined. However, in addition to the Australian Electoral Study (AES) data, it is also possible to analyse environmental group membership using National Social Science Survey (NSSS) data. The NSSS data also allows the use of variables that measure cultural consumption (lifestyle) and fathers education.

Model 1 shows the impact of social background variables on environmental group membership. It is notable that there are some differences between the surveys, especially for father's class location. The analysis of the 1990 AES data shows that respondents whose fathers were social and cultural professionals when respondents were aged 14, are nineteen per cent more likely to join environmental groups than those from working class backgrounds. Yet the 1993 AES results only show significant effects for children of technical professionals (9%) and middle class fathers (4%), while there are no significant father's class effects for the NSSS.

Father's education is an important predictor of membership. The likelihood of a respondent joining an environmental group increases at the mean of the dependent variable by 0.8 per cent for every extra year of fathers education (Table 7.7: Model 1). On the other hand, respondent's education is only a moderate predictor of membership. Those with degrees or diplomas are more likely than non-tertiary

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<sup>10</sup> The relative effects of the independent variables are examined in more detail below.

educated respondents to join an environmental group, although the differences are small. For the AES, those with a degree are five per cent more likely to join than the non tertiary educated in 1990, increasing to nine per cent in 1993.

Some additional analyses of the relationship between education and membership were also conducted using 1993 AES data (see Appendix B Table II). Degrees were divided into higher degree, postgraduate diploma, and bachelor degree. The results show that higher degree holders are about four times more likely than those without a tertiary education to join an environmental group, although no other significant education effects were produced for actual members. There are also educational differences between actual and potential members. Those with diplomas, degrees, postgraduate diplomas, or higher degrees are all approximately twice as likely to have considered joining as the non tertiary educated.

It seems that for *membership*, it is not so much tertiary education that is important, but holding a higher degree, while for *potential membership*, it is tertiary education *per se* that is important. Such findings - particularly the higher degree results - support the notion that environmental activists stem from an 'intellectual' status category.

Of particular interest is the finding that respondent's cultural consumption during adolescence is a significant predictor of environmental group membership (Table 7.7). The cultural consumption scale measures consumption of 'beaux arts' (attendance at art museums and galleries, classical concerts, theatre, ballet), and 'scholastic literature' (reading 'serious' novels or poetry, science, mathematics, technology, history books or biographies) at age fourteen. Used here as a lifestyle indicator, comparison of the highest cultural consumers with the lowest translates to seventeen per cent increase in the likelihood of joining.<sup>11</sup> The results suggest that style of life has an effect on the likelihood of joining an environmental group.<sup>12</sup> It is

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<sup>11</sup> However, few respondents are at the upper extreme of the adolescent cultural consumption scale (see mean scores, Appendix C). Parents cultural consumption is omitted from the analysis for Models 2 to 4, as it is highly correlated with respondents cultural consumption at age 14 ( $r=0.47$ ).

<sup>12</sup> A separate analysis of environmental group membership was conducted with the NSSS sample divided by gender. Results showed that cultural consumption at age 14 is a significant predictor, but

important to note that this is an indicator of adolescent cultural consumption, and therefore reflects the influence of family status/lifestyle.

Model 3 adds respondents' present social location variables. The results show that controlling for the impact of other predictors, social and cultural professionals return the largest percentage differences at the mean for both Electoral Studies. Social professionals are almost ten percentage points more likely to join an environmental group than manual workers in 1990, increasing to thirteen percentage points in 1993. The 1993 AES results also show that technical professionals and managers are more likely to join environmental groups than manual workers. On the other hand, analyses of the NSSS data show a quite different picture, with no statistically significant results produced for class location. It is possible that variations in question construction between the AES and NSSS contribute to this result.<sup>13</sup> While there are some class effects for membership, it is notable that employment sector - another indicator of new class location - shows no significant results.

There are also a number of other 'social base' effects. Interestingly, suburban location produces a modest but significant *negative* effect for the NSSS. The results suggest that people who live in the suburbs are slightly less likely to join an environmental group than rural dwellers. This result contrasts the urban based 'potential membership' discussed above. Religious affiliation also has a significant, but weak effect on membership. The 1993 AES and NSSS results show that those with no religious affiliation are three to four percentage points more likely than the religiously aligned to join. Immigrants from English speaking countries other than Australia also appear to value the environment more than those born in Australia or in other overseas countries, as they are slightly more likely to join environmental groups (AES 1993: 3%,  $p>0.05$ ).

With the exception of class location, value orientation emerges as the strongest predictor of environmental group membership (see Tables 7.5 to 7.7; Model 3), as it

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for female membership only (estimate 1.65; odds ratio 5.24;  $p<0.05$ ). For male membership a positive but non significant result is produced (estimate 0.47; odds ratio 1.61;  $p>0.1$ ).

<sup>13</sup> For question wording see Chapter 5.

does for potential membership. The NSSS results produce the largest percentage differences at the mean for the postmaterialist value scale (18%), while for the AES the difference is eleven per cent in 1993, and ten per cent in 1990. Postmaterialism also seems to have a stronger effect upon environmental activism than upon environmental concerns ('attitudinal' measures).

The impact of the political orientation variables are generally much weaker for membership than for potential membership. 'Leftists' are more likely to join, although the self-identified political ideology scale (AES only) is only a moderate predictor of environmental group membership (1990: 7.0%  $p > 0.05$ ; 1993: 8.4%). The partisanship variables produce significant results for both Australian Electoral Studies. New politics party supporters are seven per cent more likely than Coalition supporters to join an environmental group in 1993. NSSS results show that both new politics party (8.1%) and ALP (3.7%) partisans are more likely to join. As with potential membership, support from those who identify with new politics parties is stronger than among ALP supporters. New politics partisan support also increases marginally from 1990 to 1993 (Tables 7.5 and 7.6). There are no real surprises here. The increased support from these partisans probably reflects the growth of green parties, and the alignment of environmental movement participants with the Australian Democrats.

It is interesting to note that the independent variables producing the largest effects for environmental group membership vary between the surveys. Class location (especially in the social and cultural professionals category) is the strongest predictor for the 1993 AES, while in 1990, *father's class background* (again social and cultural professionals) shows the largest effect, closely followed by respondent's class location (again in social and cultural professions). No class effects are produced for the NSSS data, where value orientations and adolescent cultural consumption have the strongest effect upon membership. The impact of value orientations are weaker but still moderate predictors of environmental group membership in the AES data, with political ideology producing an effect of similar size to value orientations in

1993. Non social base variables are important determinants of joining environmental groups, although political partisanship has a notably weaker impact on the 'behavioural' variables, than the 'attitudinal' variables discussed in Chapter 6.

Once again predicted probabilities may be calculated, on this occasion for actual rather than potential environmental members. From the analysis of the 1993 AES, an ideal typical environmental group member is a woman who holds a university degree, who is employed in a social and cultural profession, is non-religious, a postmaterialist, politically leftwing and identifies with an 'other' political party. Approximately seven out of ten people with these characteristics will join an environmental group (probability= 0.66).<sup>14</sup> Given that the probability of anyone from the general population joining an environmental group is only 0.045 (4.5% for the 1993 AES), or less than one in twenty, it is apparent that a person with such characteristics is dramatically more likely to join. Nevertheless, it should be stressed that these probabilities are based upon an ideal-typical supporter having all of these characteristics. Such a category comprises a very small percentage of the population. Moreover, these are characteristics that are not unique to *environmental* supporters. Members of such a category would almost certainly be more likely to join other new politics groups and movements.

[Table 7.5-7.7 about here]

### ***Environmental protesters and demonstrators***

The third dependent variable operationalised in this chapter provides the strongest measure of commitment to environmentalism with the available data.<sup>15</sup> While joining an environmental group indicates a high level of commitment, not all members are involved in an active sense. On the other hand, participation in protest

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<sup>14</sup> The probability of joining is based upon the 1993 AES using the following calculations:  $\text{exponential}(-5.12 + 0.43 + 1.22 + 0.64 + 1.45 + 0.57 + [0.8 \times 1.15] + 1.00) = 1.97$ .  $1.97/2.97 = 0.66$ . The political ideology estimate is derived as follows:  $0.8 \times 1.15 = 0.92$ , where 0.8 represents 'left' on the political ideology scale ranging 0-1, and 1.15 is the logistic estimate.

<sup>15</sup> The demonstration dependent variable was derived from the question; 'In the last 5 years have you taken part in a protest or demonstration about an environmental issue?'

activities clearly involves the surrender of time and energy to the environmental cause. The difference between members and protesters is highlighted by the fact that while thirty-nine per cent of participants in environmental demonstrations are members of environmental groups, only eighteen per cent of environmental group members have been involved in environmental protests in the past five years.

The results of logistic regression analyses of environmental demonstrators is presented in Table 7.8. Some social background effects are evident in the results of Model 1. Respondents whose parents consumed 'high' culture are moderately more likely to demonstrate for an environmental cause, although class background and father's education have little effect (with the exception of the children of managers who are three per cent more likely to protest than children of manual workers).

In Model 2, value orientations, age, cultural consumption, and education variables are added, while parent's cultural consumption is removed from the analysis. Women emerge as slightly more likely to protest than men, while education is also a significant predictor. Respondents with a degree (odds ratio= 1.79) or some tertiary education (odds ratio= 2.07) are about twice as likely as the non-tertiary educated to take part in protests. As is the case with membership, value orientation proves to be a strong predictor of participation in demonstrations. At the mean of the dependent variable postmaterialists are some fifteen per cent more likely than materialists to participate in environmental demonstrations. Those who consumed high culture during adolescence are also more likely to be environmentally active. In general, the results for the demonstration variable are similar to those for membership.

Some weak, but interesting results appear when the remaining independent variables are added for Models 3 and 4. The impact of respondent's social location variables are minimal, and there are no statistically significant class effects. However, government sector employment does emerge as a weak predictor of environmental protest activity. Government employees are approximately twice as likely as non government employees to participate in environmental protests (odds ratio= 1.7). This is the only indication in this or the previous chapter that employment sector has

any impact upon environmental support. While the importance of such a weak finding should not be overstated, it may reflect a tendency on behalf of the highly unionised public sector to engage in protest activities.

Religion also has some impact on protest activity. Those indicating no religious affiliation are about five per cent more likely to demonstrate than the religiously aligned, which is slightly stronger than the effect shown for membership.

Interestingly, partisanship has little effect on propensity to protest. ALP supporters are more likely to demonstrate than their Coalition counterparts, although the effect is very modest (2.5%  $p > 0.05$ ). More surprisingly, the new politics (other party) variable *does not* show a significant result for protesters, in contrast to the moderate results it produces for membership and potential membership.

Controlling for the impact of father's background, adolescent socialisation, present social location and political ideology, value orientations and adolescent cultural consumption have the strongest effects on ones propensity to participate in environmental protests. An ideal-typical environmental protester is a non-religiously aligned, postmaterialist woman who supports the ALP. During adolescence she was a consumer of high culture, and her father was employed as a manager. Approximately four out of ten people (predicted probability= 0.40) with these characteristics will participate in environmental demonstrations, compared to the probability of anyone in the population protesting at less than one in twenty (0.045 or 4.5 % demonstrators in the NSSS).<sup>16</sup>

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In general the importance of social location decreases in an inverse relationship to the level of commitment to environmentalism. Age is relatively important for potential membership, and class for membership, although neither impact significantly upon participation in demonstrations. Alternatively, the relative importance of value orientations, religiosity and gender increases with commitment. This reflects the fact

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<sup>16</sup> The calculations are based on the following:  $\exp(-5.56 + 0.69 + 0.68 + 1.53 + [0.8 \times 1.35] + 0.70 + 0.47) = 0.66$ ;  $0.66/1.66 = 0.40$ . The cultural consumption estimate is based upon a 'high' score of 0.8 on the 0 to 1 cultural consumption scale (calculated as  $0.8 \times 1.35 = 1.08$ ).

that protests are issue-based. Environmental protesters are concerned with quality of life issues, and quality of life is not related to sectional (class) interests, nor is it the exclusive domain of any particular age group.

[Table 7.8 about here]

### ***The relative importance of social location on environmental activism***

In this section, an evaluation of the relative impact of the independent variables is undertaken. Each influence, or group of influences (independent variables) is deleted from the regression model and the decrease in the likelihood ratio (L-square) from the full model is noted. This provides another method of evaluating the relative importance of predictor variables.

The results presented in Appendix B, Tables III and IV show the contribution to the fit of the model for all influences on *potential* membership. The most important predictor is age, followed by value orientations. Younger people, and those holding postmaterialist value orientations are more likely to have considered joining an environmental group than members of any other social category. Political party identification and education are also important, as is no religion (in 1990 only). Class location does not show a significant fit with the data for either AES sample.

However, the results in Appendix B, Tables V-VII show that class is the most important contributor to model fit for environmental group *membership* (AES data). Value orientations are also significant, and rank first for the NSSS data. Age does not produce a significant improvement in fit for membership, although father's education and cultural consumption at age 14 also make small but significant contributions to the model fit (NSSS).

Value orientation is the strongest contributor for *participation in demonstrations* (Appendix B, Table VIII). No religious affiliation and gender are also important, yet with the exception of political party identification, no other variables significantly improve the model fit (at  $p < 0.05$ ).



Overall, the model fit statistics show that the impact of social location and other effects vary according to the aspect of environmentalism being measured. Class location ranks highly for membership but is unimportant for potential membership and demonstrations. Age has the most important effect on potential membership, while the impact of value orientations ranks consistently high on all environmental measures.

The analyses above show that age and value orientations are relatively important influences on environmental behaviour, while gender differences in support are also found for a number of dependent variables. In the following sections, the impact of these variables on environmentalism is examined in greater detail.

### *Generation and age effects*

The impact of age as a predictor differs according to the aspect of environmentalism under consideration. For membership and demonstrating, age shows no significant effects. However, age does have an important impact on *potential* membership. In order to test for generation and cohort differences, a separate analysis of potential membership is conducted (Table 7.9).<sup>17</sup>

The generation model shows that controlling for the impact of other predictor variables, both postwar generations are more likely than the pre World War II generation to consider joining an environmental group. In 1990, the two postwar generation effects are of similar magnitude - generation X'ers and baby boomers are approximately twice as likely to be potential members as the prewar generation. In 1993 the pattern is similar, although generation X'ers return a slightly larger effect than baby boomers.

The 'fifteen year' cohort model reflects a gradual decline in age based support for potential membership for both 1990 and 1993, as does the 'ten year' cohort model. On the basis of these results, a life cycle interpretation of age based support for potential membership seems plausible.

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<sup>17</sup> Significant interaction effects were found for the predictor model (Model 4) for environmental group membership and the post war generation. The results shown in Table 7.9 are generation and cohort effects controlling for the impact of *all* Model 4 variables for potential membership.

The 'decade' age group model shows a similar pattern of support with a few important differences. Support for potential membership is substantially higher during the teenage years (especially in 1993), then dips during the twenties but remains at stable levels throughout the thirties. It is only after forty years of age that support begins to steadily decline. There is also a slight increase in the magnitude of the age effects for almost all age groups from 1990 to 1993. These nuances in age based support are not as apparent when age is operationalised using cohort models.

Controlling for other predictor variables, a gradual decline in support by age groups and cohorts is apparent. This implies that a life cycle effect is present for potential membership. However, the most important age related finding is that age is important only for *potential membership*.<sup>18</sup> No age based differences in support are found for actual members or demonstrators. This is an interesting finding in the light of previous studies, that show young people are more likely to join environmental groups.

[Table 7.9 about here]

### ***Pre and postwar generations***

The results of the age analyses indicate that there are some differences in environmental support for the pre and post World War II generations. In order to examine these differences further, the 1990 and 1993 Australian Electoral Study data are combined, and then divided into prewar and postwar generations (born before or after 1946).<sup>19</sup> Membership and potential membership dependent variables are subsequently regressed upon the independent variables for Model 4 (Table 7.10).

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<sup>18</sup> The potential membership results are similar to the age pattern for the 'attitudinal' aspects of environmentalism (approval of environmental groups) shown in Chapter 6.

<sup>19</sup> The combined AES sample has an N of 193 for membership, with a total sample size of 5060. The 1990 survey does not include a weighting variable so the combined sample data is unweighted. Residential location is omitted from the analysis of the combined AES data, as a relevant question was not included in the 1990 AES survey.

Respondents whose fathers were employed in social and cultural professions are seven times more likely to join an environmental group than children of manual workers for the prewar sub sample. Respondent's class location in social and cultural professions also has a significant influence on membership for both sub samples. However, the impact of class location on membership and potential membership is stronger in the prewar sub sample, with no significant results for class location on potential membership in the post war sub sample. This may suggest that the importance of class location, especially among new class professions is declining for the postwar generation. Such an interpretation is consistent with explanations of conventional politics (for example, Franklin et al 1992) and those suggesting a decline in the impact of class (for example, Pakulski and Waters 1996).

Alternatively, the impact of value orientations is stronger for the post war sub sample, particularly for membership. Education effects also vary between the two sub samples. Those with a degree are slightly more supportive for the postwar sub sample on both dependent variables. Having a diploma is also a significant predictor of membership with the prewar sub sample, and for both sub samples on potential membership.

Political ideology (left-right) also impacts differently upon the pre and post war cohorts. Members born after the Second World War are slightly more 'left', while no political ideology effects are found for the pre war sub sample. Similarly, postwar potential members show stronger political ideology effects than those born before the war. If support for environmentalism from the ideologically 'left' is an indication that new political issues are aligned on a new politics (left) cleavage, it appears that this new cleavage is also differentiated according to age.

The partisanship results suggest that supporters of 'other' parties and the ALP are more likely to join environmental groups than Coalition supporters for the prewar sample. 'Other' party supporters born before the Second World War are approximately four and a half times more likely to join than Coalition supporters, although no significant effects are present for the post war sample. This is a

somewhat puzzling finding. Perhaps the stronger effects of higher education apparent among postwar *members* to some extent diminishes the impact of partisanship.

Potential members show little difference in partisan support between the cohorts, with new politics party and ALP supporters again more likely to have considered joining environmental groups for both sub samples.

While the pattern of age based support found above (Table 7.9) resembles a life cycle rather than a generational effect, the results in Table 7.10 show that there are some differences in the factors influencing environmentalism between the pre and post war cohorts. Class location and partisanship effects are stronger for the prewar generation, while for the postwar generation, education and political ideology are stronger, indicating that the impact of social location on environmentalism in Australia varies by generation. These results again echo the findings of Franklin et al (1992) on generational differences in voting behaviour. They found that the percentage of variance in left voting explained by structural location is markedly lower for postwar generations (1992:396). It appears that structural factors have less and less impact upon both 'old' and 'new' politics.

Nevertheless it must be stressed again that these generational findings are tentative. In the absence of panel data it is not possible to *clearly* differentiate between life cycle and generational effects.

[Table 7.10 about here]

### *Value orientations and age*

The results presented above and in Chapter 6 show that value orientations have a relatively important influence on support for environmentalism. These effects remain even after controlling for the effect of social background, social location, age, gender, cultural consumption and education. Such findings support Inglehart's claims that postmaterialists are more likely to join and approve of environmental groups than materialists (Inglehart 1990b). However, for some dependent variables (potential membership, approval of environmental groups, environmental issues scale), age effects are also present. Younger people appear to be generally more likely to support environmentalism.

This effect may be linked to another of Inglehart's hypotheses. Inglehart claims that postmaterialists are more supportive of quality of life issues (such as environmentalism) than materialists. He also maintains that younger people are more postmaterialist than older people. The young therefore tend to be more supportive of environmental groups because they are more postmaterialist than their older counterparts (Inglehart 1990a, 1990b).

The surprising finding with the Australian data however, is that both *age and value orientations* show significant effects on environmental dependent variables. Given that both effects are significant in the multivariate analyses, it is possible that the relationship between age and value orientations is weak, contrary to Inglehart's claims. In order to examine this possibility, logistic regression analyses of dichotomous postmaterialist and materialist variables are conducted, with various age models as independent variables (Table 7.11).<sup>20</sup>

Age proves to be a very poor predictor of postmaterialist value orientations from the results of the AES data. The L-square statistics in the first two columns of Table 7.11, show that only the 'decade' age group model for 1990 differs significantly from

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<sup>20</sup> The postmaterialist and materialist variables are constructed from Inglehart's four item battery discussed in Chapter 4 above. For the purposes of this analysis, dependent variables are coded as follows: a) postmaterialists= 1, materialists and mixed= 0; b) materialists= 1, postmaterialists and mixed= 0.

the null model (L-square 16.77; df 6;  $p=0.01$ ). The results show that with the exception of teenagers, none of the cohorts are more likely than the seventy and over category to hold postmaterialist value orientations.

The model fit statistics for the materialist dependent variable show a slight improvement on those for postmaterialists, with four of the models returning significant model fit statistics at better than the ninety five per cent confidence level. However, analyses of the age based estimates and odds ratios show that there are few significant results for any of the age models. In general, younger cohorts are less likely to hold materialist values than the oldest cohorts, although it must be stressed that these age based differences are very modest.

How do these findings impact upon Inglehart's hypotheses? Based on the results above, value orientation is a moderate predictor of environmentalism on most dependent variables. However, the results presented in Table 7.1.1 show that these generation/age differences in support for environmentalism are not due to the value orientations held by different age groups. If Inglehart is correct, the young should not only be more pro environmental, but also more postmaterialist than the old. The results suggest that he is only partly correct. Postmaterialism is a predictor of environmentalism, but in Australia, the level of postmaterialism is not differentiated according to generations or cohorts.

[Table 7.1.1 about here]

### ***Gender and environmentalism***

The results in this chapter and Chapter 6 show consistent although moderate differences in gender based support for environmentalism. Women are generally more supportive of environmentalism than men. To explore this relationship further, further analyses of the Australian Electoral Study data are conducted.<sup>21</sup> To maximise

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<sup>21</sup> Significant interactions were found for gender and the predictor model (Model 4) for potential environmental group membership.

membership numbers, the 1990 and 1993 AES surveys are combined and the data is then divided on the basis of gender. The membership and potential membership dependent variables are regressed upon the independent variables (Model 4: social background+adolescent socialisation+present social location+political ideology). The results presented in Table 7.12 show a number of interesting gender based differences.

While age is a weak predictor of environmental group *membership*, when the sample is divided on the basis of gender, some differences in age based support are apparent. Environmental support is stronger among teenagers and the 30-39 cohort for the female sub-sample (although only at  $p>0.05$ ). Education is also marginally stronger for the female sub sample, while the effect of value orientations on membership is slightly stronger for men.

Some gender differences in class based support for membership also emerge. While both social and cultural professionals and managers of both sexes are more likely to join environmental groups than manual workers, there is some variation in support among other new class categories. Female technical professionals are significantly more likely to join than manual workers, a result not found for men. There are also some significant results for father's class location, with both male and female children of social and cultural professionals more likely to join than children of manual workers. The predictive power of religious affiliation differs according to gender, as the 'no religion' variable has a significant influence on women members, but not on men.

Gender differences are also evident for *potential membership*. Age is an important predictor of male and female potential membership, with support strongest among teenage potential members of both sexes.<sup>22</sup> Support then gradually diminishes with age. However, it is notable that the regression estimates (and odds ratios) by age groups for women potential members are considerably larger.

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<sup>22</sup> However due to the small number of teenage respondents (teenage men  $n=18$ ; teenage women  $n=27$ ), the reliability of these results is questionable.

The value orientation results show that both male and female postmaterialists are more likely to have considered joining environmental groups than materialists. However, while the male sub sample for potential members shows no significant class effects, women employed in social and cultural professions are twice as likely as female manual workers to have considered joining. Female human services and technical professionals are also more likely to be potential members than manual workers. This new class support for potential membership among women appears to be subsumed in the full sample analyses above (Tables 7.3 and 7.4).

It is interesting that while leftwing males are more likely than rightwing males to join, or to have considered joining environmental groups, this is not the case for women. Yet, while male environmentalists are more ideologically 'left' than females, there are no gender differences in partisanship. New politics party supporters are approximately twice as likely as Coalition supporters to join or consider joining environmental groups, regardless of gender. Similarly, ALP supporters of both sexes are slightly more likely than Coalition supporters to be potential members.

Variations in gender support are further highlighted by an examination of the 'percentage of the null' statistics. While there are only slight differences between the male and female sub samples for membership (% of null fitted: men 14%; women 15%), there are notable differences for potential membership (% of null fitted: men 9%; women 14%). The model fit statistics confirm that social location has a greater impact upon female than male potential membership, presumably because of the stronger age and class effects for women.

[Table 7.12 about here]

## **Discussion**

The analyses of environmentalism using the three 'behavioural' variables highlights a number of important findings. Let me begin with a puzzling generational configuration. Postmaterialist value orientations are consistently important influences on environmental behaviour in Australia. However, the association between value



orientations and generations is very weak. As mentioned in Chapter 3, one reason for this may be that unlike in European societies, the impact of major social and economic events such as the Second World War, and the subsequent economic 'boom', have been weaker and more muted in Australia. The formative experiences of Australians may have varied less from one generation to the next than in other countries, and consequently generational effects reflected in higher levels of postmaterialist value priorities are also less marked. However, a comparative analysis is needed to evaluate the validity of such an hypothesis.

Age is the most important indicator of potential membership, although it is a poor predictor of membership and participation in demonstrations. The most clear difference in age based support is found between the pre and post World War II generations for potential membership, although in general, the pattern of age based resembles a life cycle effect. There are no abrupt changes in age based support for environmentalism, such as the marked differences between cohorts that would be expected if generational effects were present. Support tends to gradually diminish with age.

Location in 'new class' occupations is a relatively important factor for membership, but far less so for potential membership and participation in demonstrations. This may give some comfort to new class theorists. The social and cultural professionals that approximate Kristol's new class return the strongest results for membership. Human services and technical professionals, representing Gouldner's 'humanistic intellectuals' and 'technical intelligentsia' respectively, are also significantly more likely to join or consider joining. New class location remains a significant - though only moderate strength predictor - of membership even after controlling for the impact of other factors such as postmaterialist values, suggesting that career socialisation may have an impact on the propensity to support environmental groups.<sup>23</sup>

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<sup>23</sup> However, it is difficult to distinguish between the impact of career socialisation effects on the propensity to join an environmental group, and a predisposition for environmental supporters to select a certain type of occupation. Parkin (1968) suggests that values may impact upon career choices,

Other new class versions fare much worse. Employment sector location has little or no effect on environmental behaviour. Public sector employment does not impact upon potential membership or membership, and only very weakly on the demonstration dependent variable. This contradicts the 'statist' new class theorists such as Mattausch (1989), who hypothesise that state sector employment is an important base of new politics.

Status interpretations, by contrast, fare somewhat better. Education, particularly tertiary education, is a significant predictor of potential membership, although it produces far weaker results for the membership and demonstration dependent variables.<sup>24</sup> However, this statement should be qualified by noting that holding a *higher degree* (PhD or Masters) is an important determinant of membership. This may mean that cognitive capacities have an activating impact upon membership. However, in general (achieved) status differences appear to be less important for understanding why people participate in environmental activities (demonstrate) than for explaining environmental sympathy (potential membership).

Perhaps the most interesting finding relates to the cultural consumption 'lifestyle' indicator. Controlling for other independent variables, respondents who score high on the cultural consumption scale during adolescence are significantly more likely to join environmental groups, and to participate in environmental demonstrations. Perhaps this is because cultural consumption is a form of education. Although it differs from formal education in schools and universities, it may instil a certain idealism in adolescents - a taste for higher truth and meaning - that later emerges as support for an 'idealistic' cause. Such findings indicate that style of life also impacts upon environmental support.

Secular respondents are more supportive of environmentalism than those with a religious affiliation, which is perhaps not surprising. However, given that support

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although the effect of value orientation is controlled for to some extent here with the inclusion of the value orientation variable.

<sup>24</sup> The impact of education on the NSSS membership and demonstrator dependent variables is only minimally diminished by the inclusion of cultural consumption at age 14 (see Appendix B, Tables X and XI).

among the non religious category has decreased from 1990 to 1993, environmental groups are possibly becoming more widely accepted among those with religious beliefs. It also appears that for many people the environment or 'nature' does have some kind of religious significance. An analysis of the NSSS data reveals that while almost half of all environmental group members and demonstrators believe that nature is spiritual or sacred in itself, only twenty per cent or less believe that it is sacred because it was created by God (Table 7.13). The remainder believe that nature is important, but not sacred.<sup>25</sup>

(Table 7.13 about here)

Controlling for the effects of social location and other factors, those who believe that 'nature is sacred in itself' are more likely than those who believe that nature is important but not sacred to both join environmental groups and to participate in environmental demonstrations (see Appendix B, Table IX). Those who believe that nature is 'created by god' are also more likely to participate in demonstrations, but not to join environmental groups. While those affiliated with traditional religious denominations are less likely to be environmentalists, as seen above, it seems that there is a link between the sacred or spiritual and the natural environment for many supporters. Such an interpretation supports Easthope and Holloway's (1989) contention that many in the environment movement see the wilderness or nature as 'sacred'.

A number of other factors also produce interesting results, in some cases due to their unexpectedly low magnitude. Urban location is a weak predictor of potential membership, but is not significant for joining environmental groups. Suburban dwellers are actually less likely to join than those living in rural areas. Perhaps these findings reflect a higher level of *sympathy* for environmental groups in the more

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<sup>25</sup> These responses are derived from the question: "Which statement comes closest to your views... Nature is sacred because it is created by God; Nature is spiritual or sacred in itself: Nature is important, but not spiritual or sacred?"

populated areas. On the other hand, they may also indicate a tendency for rural dwellers to participate in certain types of environmental groups (such as Landcare and Greening Australia). Certainly the impact of such groups has a more direct impact upon rural communities.

The country of birth variable shows no significant results on any of the 'behavioural' dependent variables with the exception of environmental group membership in 1993 (AES only). There is therefore little support for the notion that people born in English speaking countries other than Australia, are more sympathetic toward environmentalism than others.

Political ideology is a moderate predictor of environmentalism. Those who place themselves on the left of the political spectrum are generally more supportive of environmentalism than those on the right. These results support previous studies that find links between the ideological 'left' and support for new political groups (for example, Kitschelt 1990, Kitschelt and Hellemans 1990).

The impact of political partisanship is strong, with new politics party and ALP supporters more likely to be environmentally active than supporters of the Coalition. The effect of new politics partisanship although strong, is not surprising. This category is largely comprised of the Australian Democrats and Greens. Like the Greens, the Democrats seek to capture the 'green' vote (McAllister and Studlar 1993), and have strong ties with environmental groups.

The ALP has successfully courted the support of environmental organisations at Federal elections since winning office in 1983 (Papadakis 1994), and therefore the ALP partisan results are not unexpected. However, it is interesting to note that the impact of party identification in general is weaker on the 'behavioural' than the 'attitudinal' dependent variables. In Chapter 6, political partisanship emerges as the strongest predictor on all 'attitudinal' dependent variables, while it ranks consistently lower on environmental group membership, potential membership and participation in

demonstrations.<sup>26</sup> It seems that partisanship has an impact upon the formation of attitudes toward environmentalism, but is less important in influencing behaviour.

Finally, gender differences contribute to a number of social location effects for environmental behaviour. The relatively strong age effects for potential membership appear to be largely due to stronger age effects among women. Similarly, it seems to be secular *women*, rather than the secular *per se* that are environmentally active, while activism among the ideological 'left' appears to be overwhelmingly male based.

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<sup>26</sup> Party identification ranks second on membership in the analysis of NSSS data, but not better than third for other dependent variables.

**Table 7.1: Bivariate Analysis of Environmental Group Membership (percentages)**

Variable	Members	Have Considered Joining	Not Considered Joining	Never Join	N
<b>Father's Class</b>					
Social & Cultural Professionals	6	33	43	18	(38)
Human Service Professionals	6	19	60	15	(103)
Technical Professionals	10	28	41	20	(137)
Managers	5	17	52	26	(515)
Middle Class	6	20	52	22	(229)
Workers	3	18	52	26	(1018)
<b>Respondent's Class</b>					
Social & Cultural Professionals	19	29	43	8	(52)
Human Service Professionals	8	28	47	16	(226)
Technical Professionals	11	25	48	15	(168)
Managers	7	14	55	24	(268)
Middle Class	2	21	53	24	(624)
Workers	3	17	53	27	(664)
<b>'Decades'</b>					
18-19	12	43	26	19	(24)
20-29	3	29	50	18	(283)
30-39	6	28	48	17	(444)
40-49	6	19	55	21	(489)
50-59	5	15	55	25	(374)
60-69	3	13	53	30	(372)
70+	2	8	44	46	(294)
<b>Gender</b>					
Male	4	18	54	23	(1156)
Female	5	20	48	28	(1166)
<b>Value Orientation</b>					
Postmaterialist	10	31	41	17	(323)
Materialist	2	12	56	30	(495)
Mixed	4	19	51	26	(1536)
<b>Education</b>					
Degree	12	32	44	13	(340)
Diploma	6	28	48	17	(191)
Other	3	20	52	24	(773)
No Post Secondary Education	3	12	53	32	(960)
<b>Employment Sector</b>					
Public	5	22	54	19	(623)
Other	5	19	51	25	(1357)
<b>Residence</b>					
Urban	4	22	51	24	(774)
Suburban	6	19	51	24	(612)
Rural	4	16	51	28	(965)
<b>Religiosity</b>					
Religion	4	18	52	27	(2032)
No Religion	10	26	46	18	(334)
<b>Country of Birth</b>					
English Speaking Country	7	20	47	25	(248)
Australia, NZ and Other Countries	4	19	51	26	(2078)
<b>Political Orientation</b>					
Left	9	34	39	19	(369)
Middle	4	19	55	23	(987)
Right	3	15	54	28	(638)
<b>Political Party Identification</b>					
Coalition	3	14	51	31	(956)
Other	15	29	38	17	(62)
ALP	4	24	49	22	(1038)
Sample	4.5	18.1	51.5	25.9	

notes: weighted n=2388

Source: 1993 Australian Electoral Study

**Table 7.2: Bivariate Analysis of Environmental Group Membership and Participation in Demonstrations (percentages)**

Variable	Members	Not a Member	Demonstrate	Not Demonstrate	N
<b>Father's Class</b>					
Social & Cultural Professionals	12	88	10	90	(42)
Human Service Professionals	8	92	3	97	(38)
Technical Professionals	14	86	5	95	(150)
Managers	11	89	7	93	(432)
Middle Class	9	91	3	97	(279)
Workers	8	92	3	97	(686)
<b>Respondent's Class</b>					
Social & Cultural Professionals	15	85	8	92	(65)
Human Service Professionals	16	84	8	92	(181)
Technical Professionals	15	85	4	96	(171)
Managers	10	90	5	95	(187)
Middle Class	8	92	3	97	(470)
Workers	6	94	4	96	(380)
<b>'Decades'</b>					
18-19	-	-	-	-	-
20-29	11	89	3	97	(168)
30-39	11	89	6	94	(349)
40-49	10	90	6	94	(421)
50-59	10	90	3	97	(313)
60-69	8	92	3	97	(282)
70+	8	92	6	94	(213)
<b>Gender</b>					
Male	10	90	3	97	(909)
Female	9	91	6	94	(866)
<b>Value Orientation</b>					
Postmaterialist	18	82	11	89	(229)
Materialist	4	96	3	97	(260)
Mixed	9	91	3	97	(1156)
<b>Education</b>					
Degree	17	83	8	92	(309)
Some Tertiary	15	85	8	92	(141)
No Tertiary	7	93	3	97	(1329)
<b>Employment Sector</b>					
Public	13	87	7	93	(450)
Other	9	91	4	96	(1329)
<b>Residence</b>					
Urban	11	89	3	97	(203)
Suburban	9	91	5	95	(1236)
Rural	12	89	5	95	(324)
<b>Religious Denomination</b>					
Religion	8	92	3	97	(1367)
No Religion	14	86	8	92	(412)
<b>Political Party Identification</b>					
Coalition	7	93	3	97	(733)
Other	20	80	8	92	(89)
ALP	10	90	5	95	(778)
<b>Sample</b>	<b>9.7</b>	<b>90.3</b>	<b>4.5</b>	<b>95.5</b>	

notes: n=1779

Source: 1993 National Social Science Survey

**Table 7.3: Logistic Regression Estimates (percentages at Grand Mean) for Predictors of Potential Environmental Group Members (AES 1990).**

	Model 1	Model 2	Model 3	Model 4
Intercept	-1.42	-1.01	-1.26	-2.01
Father's Class				
Social	1.07*** (23.0)	0.68** (13.6)	0.70** (14.1)	0.75** (15.2)
Human Services	0.54 (10.5)	0.26 (4.7)	0.22 (4.0)	0.33 (6.1)
Technical	0.70** (14.1)	0.53** (10.3)	0.49** (9.4)	0.53** (10.3)
Manager	0.10 (1.7)	0.06 (1.0)	0.07 (1.2)	0.16 (2.8)
Middle Class	0.31* (5.7)	0.13 (2.3)	0.07 (1.2)	0.08 (1.4)
Age		-0.02*** (-0.3)	-0.03*** (-0.5)	-0.02*** (-0.3)
Female		0.23** (4.2)	0.16 (2.8)	0.14 (2.5)
Value Orientation		1.20*** (26.2)	1.14*** (24.7)	1.09*** (23.5)
Degree		0.84*** (17.4)	0.51** (9.9)	0.49** (9.4)
Diploma		0.69*** (13.9)	0.47** (9.0)	0.53** (10.3)
Class				
Social			0.42 (7.9)	0.42 (7.9)
Human			0.55** (10.7)	0.61** (12.1)
Technical			0.10 (1.7)	0.22 (4.0)
Manager			-0.09 (-1.5)	0.04 (0.7)
Middle Class			0.27* (4.9)	0.32** (5.9)
Government Sector			0.20 (3.6)	0.13 (2.3)
Other Bases				
No Religion			0.70*** (14.1)	0.60*** (11.8)
English Speaking			-0.05 (-0.8)	-0.10 (-1.6)
Country				



**Table 7.3 continued.**

Political Ideology				0.76** (15.5)
Other Party				0.76*** (15.5)
Labor				0.41** (7.7)
Null Model	2066.65	2066.65	2066.65	2066.65
Full Model	2045.57	1893.16	1862.16	1834.91
L2	21.08	173.49	204.49	231.74
df	5	10	18	21
% of null fitted	0.01	0.08	0.10	0.11
potential membership n	428	428	428	428
n	1979	1979	1979	1979

Notes: \* <0.1 \*\* P<0.05 \*\*\* P<0.001. Logistic regression estimates are reported. Percentages differences at the mean of the dependent variable are shown in parenthesis. Dependent Variable is potential membership of environmental groups (actual members are excluded from the analysis).  
Class: Technical Professionals: Natural scientists, engineers, surveyors, computing professionals, miscellaneous professionals (excluding librarians) mathematicians, statisticians and actuaries, other professionals, economists, accountants, public relations officers, other business professionals, technical officers (medical science, engineering, and air and sea transport); Social & Cultural Professionals: Medical practitioners and lawyers, university and CAE teachers, Artists and related professionals, education researchers, other social scientists, architects, ministers of religion; Human Services Professionals: Health Diagnosis and Treatment (excluding medical practitioners), teachers, social workers, librarians, counsellors, nurses, psychologists; Middle Class: Clerks, Sales & Personal Service Workers, Police, Miscellaneous para-professionals; Working class (reference category): Trades, Plant and Machine Operators, and Drivers; Labourers and Related Workers  
Value Orientation: 0=materialist; 0.5=mixed; 1=postmaterialist. Political Ideology is a scale 10 steps from far right to far left.  
Party Identification scale: Coalition= Liberal and National parties, Other= Australian Democrats, greens and other;  
ALP=Australian Labor Party.

Source: 1993 National Social Science Survey

**Table 7.4: Logistic Regression Estimates (Percentages at Grand Mean) for Predictors of Potential Environmental Group Members (AES 1993).**

	Model 1	Model 2	Model 3	Model 4
Intercept	-1.49	-0.93	-1.08	-1.99
Social	0.87** (16.8)	0.32 (5.4)	0.28 (4.6)	0.38 (6.5)
Human Services	0.13 (2.1)	-0.16 (-2.3)	-0.16 (-2.3)	-0.12 (-1.8)
Technical	0.70*** (13.0)	0.26 (4.3)	0.18 (2.9)	0.27 (4.3)
Manager	-0.02 (-0.3)	0.02 (0.3)	0.04 (0.6)	0.16 (2.6)
Middle Class	0.19 (3.1)	-0.02 (-0.3)	-0.01 (-0.2)	0.07 (1.1)
Age		-0.03*** (-0.5)	-0.03*** (-0.5)	-0.03*** (-0.5)
Female		0.15 (2.4)	0.09 (1.4)	0.10 (1.6)
Value Orientation		1.27*** (26.3)	1.23*** (25.4)	1.10*** (22.2)
Degree		0.82*** (15.6)	0.73*** (13.6)	0.75*** (14.1)
Diploma		0.75*** (14.1)	0.70*** (13.0)	0.77*** (14.5)
Social			0.12 (1.9)	0.18 (2.9)
Human			0.14 (2.2)	0.20 (3.2)
Technical			0.02 (0.3)	0.11 (1.7)
Manager			-0.25 (-3.5)	-0.08 (-1.2)
Middle Class			0.10 (1.6)	0.17 (2.7)
Government Sector			0.05 (0.8)	-0.02 (-0.3)
Urban Location			0.27** (4.5)	0.23 (3.8)
Suburban			0.05 (0.8)	0.06 (0.9)
No Religion			0.27* (4.5)	0.18 (2.9)
English Speaking Country			0.27 (4.5)	0.22 (3.6)

Table 7.4 continued

Political Ideology				1.09*** (21.9)
Other Party				0.73** (13.6)
Labor				0.52*** (9.2)
Null Model	2260.69	2260.69	2260.69	2260.69
Full Model	2243.93	2067.21	2053.05	2008.90
L2	16.76	193.48	207.64	251.79
df	5	10	20	23
% of null fitted	0.01	0.08	0.09	0.11
potential membership n	448	448	448	448
n	2281	2281	2281	2281

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001 Logistic regression estimates are reported. Percentages differences at the mean of the dependent variable are shown in parenthesis. Dependent Variable is potential membership of environmental groups (actual members are excluded from the analysis).

Classes: Technical professionals: scientists, building professionals, engineers, and business professionals, medical and science technical officers and technicians, engineering and building technical officers and technicians, air and sea transport technical workers; Social and Cultural professionals: university and TAFE teachers and instructors, arts and health professionals, health diagnosis and treatment professionals; Human Services professionals: teachers, social workers, nurses, police and other para- professionals.

Managers: all managers and managing supervisors; Middle class: Clerks, Sales & Personal Service Workers; Working class (reference category): Trades, Plant and Machine Operators, and Drivers; Labourers and Related Workers.

Value Orientation: 0=materialist; 0.5=mixed, 1=postmaterialist. Party Identification scale: Coalition= Liberal and National parties; Other= Australian Democrats, greens and other; ALP=Australian Labor Party. Political Ideology is a scale 10 steps from far right to far left.

Source: 1993 Australian Electoral Study

**Table 7.5: Logistic Regression Estimates (Percentages at Grand Mean) for Predictors of Environmental Group Membership (AES 1990).**

	Model 1	Model 2	Model 3	Model 4
Intercept	-3.91	-4.98	-5.10	-5.98
Father's Class				
Social	2.28*** (19.4)	1.83*** (12.6)	1.76*** (11.7)	1.63*** (10.2)
Human Services	0.89 (3.8)	0.54 (1.9)	0.52 (1.9)	0.53 (1.9)
Technical	0.77 (3.1)	0.55 (2.0)	0.48 (1.7)	0.41 (1.4)
Manager	0.38 (1.3)	0.25 (0.8)	0.12 (0.4)	0.16 (0.5)
Middle Class	0.47 (1.6)	0.32 (1.0)	0.21 (0.6)	0.15 (0.4)
Age		-0.003 (-0.0)	-0.005 (-0.0)	-0.001 (-0.0)
Female		0.35 (1.1)	0.59* (2.2)	0.49 (1.7)
Value Orientation		1.67*** (10.6)	1.58*** (9.6)	1.36** (7.4)
Degree		1.08** (5.1)	0.48 (1.7)	0.47 (1.6)
Diploma		0.68* (2.6)	0.3 (1.0)	0.42 (1.4)
Class				
Social			1.57** (9.5)	1.49** (8.7)
Human			0.61 (2.3)	0.61 (2.3)
Technical			0.51 (1.8)	0.61 (2.3)
Manager			0.68 (2.6)	0.82* (3.4)
Middle Class			-0.34 (-0.8)	-0.32 (-0.8)
Government Sector			-0.06 (-0.2)	-0.12 (-0.3)
Other Bases				
No Religion			0.50 (1.8)	0.32 (1.0)
English Speaking			-0.02 (-0.1)	-0.16 (-0.4)
Country				
Political Ideology				1.32* (7.0)
Other Party				0.97** (4.3)
Labor				0.26 (0.8)
Null Model	527.15	527.15	527.15	527.15
Full Model	504.82	474.79	459.69	449.59
L2	22.32	52.35	67.45	77.55
df	5	10	18	21
% of null fitted	0.04	0.10	0.13	0.15
membership n	58	58	58	58
n	2037	2037	2037	2037

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001

Logistic regression estimates are reported. Percentages differences at the mean of the dependent variable are shown in parenthesis. Dependent variable is membership of environmental groups.

Independent variables as per Table 7.3. For additional explanation see research and design chapter

Source: 1990 Australian Electoral Study

**Table 7.6: Logistic Regression Estimates (Percentages at Grand Mean) for Predictors of Environmental Group Membership (AES 1993).**

	Model 1	Model 2	Model 3	Model 4
Intercept	-3.38	-4.21	-4.54	-5.12
<b>Father's Class</b>				
Social	0.55 (3.0)	-0.03 (-0.1)	-0.20 (-0.8)	-0.33 (-1.2)
Human Services	0.54 (3.0)	0.26 (1.3)	0.12 (0.5)	0.08 (0.4)
Technical	1.19*** (8.9)	0.53 (0.29)	0.41 (2.1)	0.39 (2.0)
Manager	0.44 (2.3)	0.37 (1.9)	0.32 (1.6)	0.36 (1.8)
Middle Class	0.67** (4.0)	0.42 (2.2)	0.41 (2.1)	0.44 (2.3)
Age		-0.005 (-0.0)	-0.005 (-0.0)	-0.002 (-0.0)
Female		0.18 (0.8)	0.47** (2.5)	0.43** (2.2)
Value Orientation		1.48*** (12.6)	1.38*** (11.2)	1.22*** (9.2)
Degree		1.22*** (9.2)	0.62** (3.5)	0.64** (3.7)
Diploma		0.63** (3.6)	0.19 (0.9)	0.24 (1.1)
Social			1.52*** (13.1)	1.45** (12.2)
Human			0.72 (4.3)	0.70 (4.1)
Technical			1.09** (7.7)	1.04** (7.2)
Manager			0.79** (4.9)	0.84** (5.3)
Middle Class			-0.42 (-1.5)	-0.40 (-1.4)
Government Sector			-0.31 (-1.2)	-0.34 (-1.2)
Urban Location			-0.35 (-1.3)	-0.40 (-1.4)
Suburban			0.29 (1.4)	0.29 (1.4)
No Religion			0.64** (3.7)	0.57** (3.2)
English Speaking Country			0.55* (3.0)	0.51* (2.8)
Political Ideology				1.15** (8.4)
Other Party				1.00** (6.8)
Labor				-0.03 (-0.1)
Null Model	872.99	872.99	872.99	872.99
Full Model	858.19	806.00	767.27	757.03
L2	14.80	66.99	105.72	115.96
df	5	10	20	23
% of null fitted	0.02	0.08	0.12	0.13
membership n	107	107	107	107
n	2388	2388	2388	2388

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001

Logistic regression estimates are reported. Percentages differences at the mean of the dependent variable are shown in parenthesis. Dependent variable is membership of environmental groups.

Independent variables as per Table 7.4. For additional explanation see research and design chapter.

Source: 1993 Australian Electoral Study

**Table 7.7: Logistic Regression Estimates (Percentages at Grand Mean) for Predictors of Environmental Group Membership (NSSS 1993).**

	Model 1	Model 2	Model 3	Model 4
Intercept	-3.55	-4.06	-4.03	-4.29
Fathers Education (years)	0.09** (0.8)	0.07** (0.06)	0.07** (0.6)	0.07** (0.6)
Father's Class				
Social	-0.22 (-1.7)	-0.31 (-2.4)	-0.33 (-2.5)	-0.32 (-2.4)
Human Services	-0.52 (-3.6)	-0.55 (-3.8)	-0.66 (-4.4)	-0.61 (-4.1)
Technical	0.23 (2.2)	0.21 (2.0)	0.19 (1.8)	0.17 (1.6)
Manager	0.24 (2.3)	0.21 (2.0)	0.18 (1.7)	0.21 (2.0)
Middle Class	0.04 (0.4)	-0.04 (-0.3)	-0.009 (-0.1)	-0.04 (-0.4)
Parents Culture	0.73 (8.4)	-	-	-
Age (years)		-0.003 (-0.0)	-0.004 (-0.0)	0.001 (0.0)
Female		-0.08 (-0.7)	-0.03 (-0.3)	-0.003 (-0.0)
Value Orientation (scale)		1.36*** (19.6)	1.29*** (18.2)	1.26*** (17.6)
Cultural Consumption at age 14 (scale)		1.24** (17.2)	1.22** (16.8)	1.16** (15.7)
Degree		0.62** (6.9)	0.39* (3.9)	0.41* (4.2)
Some Tertiary		0.59* (6.5)	0.41 (4.2)	0.41 (4.2)
Class				
Social			0.14 (1.3)	0.12 (1.1)
Human			0.38 (3.8)	0.39 (3.9)
Technical			0.39 (3.9)	0.44 (4.5)
Manager			0.03 (0.3)	0.12 (1.1)
Middle Class			-0.07 (-0.6)	-0.02 (-0.2)
Government Sector			0.17 (1.6)	0.10 (0.9)
Other Bases				
Urban Location			-0.31 (-2.4)	-0.35 (-2.6)
Suburban			-0.41** (-3.0)	-0.44** (-3.2)
No Religion			0.41** (4.2)	0.36** (3.6)

**Table 7.7 continued.**

Other Party				0.71** (8.1)
Labor				0.37** (3.7)
Null Model	1121.53	1121.53	1121.53	1121.53
Full Model	1098.34	1055.70	1041.25	1034.21
L2	23.19	65.83	80.28	87.32
df	7	12	21	23
% of null fitted	0.02	0.06	0.07	0.08
membership n	170	170	170	170
n	1779	1779	1779	1779

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001  
 Logistic regression estimates are reported. Percentages differences at the mean of the dependent variable are shown in parenthesis. Dependent variable is membership of environmental groups.  
 Independent variables as per Table 7.3. For additional explanation see research and design chapter.

Source: 1993 National Social Science Survey

**Table 7.8: Logistic Regression Estimates (Percentages at Grand Mean) for Predictors of Environmental Demonstrators (NSSS 1993).**

	Model 1	Model 2	Model 3	Model 4
Intercept	-4.03	-5.04	-5.24	-5.56
Fathers Education	0.04 (0.2)	0.02 (0.1)	0.02 (0.1)	0.03 (0.1)
Father's Class				
Social	0.56 (3.1)	0.57 (3.2)	0.67 (3.9)	0.67 (3.9)
Human Services	-0.64 (-2.1)	-0.71 (-2.2)	-0.86 (-2.5)	-0.83 (-2.5)
Technical	0.13 (0.6)	0.14 (0.6)	0.08 (0.4)	0.09 (0.4)
Manager	0.6** (3.4)	0.6** (3.4)	0.62** (3.6)	0.69** (4.1)
Middle Class	-0.16 (-0.6)	-0.24 (-0.9)	-0.18 (-0.7)	-0.17 (-0.7)
Parents Culture	1.23** (9.4)	-	-	-
Age		-0.001 (-0.0)	0.0006 (0.0)	0.002 (0.0)
Female		0.48** (2.6)	0.64** (3.7)	0.68** (4.0)
Value Orientation		1.64*** (15.0)	1.54*** (13.5)	1.53*** (13.4)
Culture (at age 14)		1.22* (9.3)	1.35** (10.9)	1.35** (10.9)
Degree		0.58** (3.3)	0.44 (2.3)	0.44 (2.3)
Some Tertiary		0.73** (4.4)	0.59 (3.3)	0.60 (3.4)
Class				
Social			-0.33 (-1.2)	-0.32 (-1.2)
Human			-0.21 (-0.8)	-0.20 (-0.8)
Technical			-0.46 (-1.6)	-0.43 (-1.5)
Manager			0.10 (0.4)	0.16 (0.7)
Middle Class			-0.54 (-1.8)	-0.5 (-1.7)
Government Sector			0.53** (2.9)	0.47* (2.5)
Other Bases				
Urban Location			-0.56 (-1.9)	-0.62 (-2.0)
Suburban			-0.09 (-0.4)	-0.15 (-0.6)
No Religion			0.76** (4.7)	0.70** (4.2)



**Table 7.8 continued.**

Other Party				0.43 (2.3)
Labor				0.47* (2.5)
Null Model	652.63	652.63	652.63	652.63
Full Model	636.57	606.53	588.59	585.09
L <sup>2</sup>	16.05	46.09	64.04	67.53
df	7	12	21	23
% of null fitted	0.02	0.07	0.10	0.10
demonstrators n	80	80	80	80
n	1779	1779	1779	1779

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001  
Logistic regression estimates are reported. Percentages differences at the mean of the dependent variable are shown in parentheses. Dependent variable is participation in environmental protests or demonstrations.  
Independent variables as per Table 7.7. For additional explanation see research and design chapter.

Source: 1993 National Social Science Survey

**Table 7.9: Logistic Regression Estimates (Odds Ratios) for Age Effects on Potential Membership of Environmental Groups, Controlling for Social Background, Adolescent Socialisation, Present Social Location and Political Ideology.**

	Potential Members 1990	Potential Members 1993
<b>Generation Model</b>		
Generation X (1960 +)	0.76*** (2.13)	0.96*** (2.61)
Baby Boomers (1946-59)	0.80*** (2.22)	0.64*** (1.89)
Pre World War II (1900-45) (reference)	-	-
<b>'15 Year' Cohort Model</b>		
Cohort 1 (1973-75)	-	1.94*** (6.94)
Cohort 2 (1966-72)	1.38*** (3.97)	1.17*** (3.24)
Cohort 3 (1951-65)	1.08*** (2.94)	1.18*** (3.27)
Cohort 4 (1936-50)	0.90*** (2.45)	0.65** (1.91)
Cohort 5 (1921-35)	0.24 (1.27)	0.23 (1.26)
Cohort 6 (1900-20 reference)	-	-
<b>'10 Year' Cohort Model</b>		
Cohort 1 (1973-75)	-	1.96*** (7.11)
Cohort 2 (1966-72)	1.12*** (3.06)	1.20*** (3.31)
Cohort 3 (1956-65)	0.81*** (2.24)	1.34*** (3.80)
Cohort 4 (1946-55)	0.87*** (2.38)	0.84*** (2.32)
Cohort 5 (1936-45)	0.42* (1.52)	0.62** (1.86)
Cohort 6 (1926-35)	-0.22 (0.80)	0.36 (1.44)
Cohort 7 (1900-25 reference)	-	-
<b>Age Groups</b>		
Aged (18-19)	1.42*** (4.13)	2.46*** (11.7)
Aged (20-29)	1.10*** (3.00)	1.34*** (3.81)
Aged (30-39)	1.16*** (3.19)	1.32*** (3.74)
Aged (40-49)	0.96*** (2.61)	0.82*** (2.27)
Aged (50-59)	0.46 (1.58)	0.55** (1.73)
Aged (60-69)	0.28 (1.32)	0.45** (1.56)
Aged (70+ reference)	-	-
N	1979	2281

Notes: Estimates control for all Model 4 predictor variables. Odds ratios are shown in parenthesis. Dependent variable is potential membership of environmental groups.

Sources: 1990 & 1993 Australian Electoral Studies

**Table 7.10: Logistic Regression Estimates (Odds Ratios) for Predictors of Environmental Group Membership by Pre and Post World War II Generations (AES)**

	Membership		Potential Membership	
	Prewar	Postwar	Prewar	Postwar
Intercept	-5.73	-5.41	-3.15	-3.14
<b>Father's Class</b>				
Social	1.92*** (6.85)	0.36 (1.44)	0.20 (1.23)	0.76** (2.13)
Human Services	0.90* (2.46)	-0.23 (0.79)	0.20 (1.22)	0.03 (1.03)
Technical	0.51 (1.66)	0.57 (1.77)	0.25 (1.27)	0.54** (1.71)
Manager	0.40 (1.49)	0.34 (1.40)	0.10 (1.10)	0.17 (1.19)
Middle Class	-0.20 (0.81)	0.42 (1.52)	-0.02 (0.97)	0.10 (1.11)
Female	0.50* (1.65)	0.54** (1.71)	-0.14 (0.87)	0.24** (1.27)
Value Orientation	0.83** (2.29)	1.37*** (3.95)	1.04*** (2.83)	1.16*** (3.20)
<b>Education</b>				
Degree	0.30 (1.35)	0.70** (2.02)	0.43* (1.54)	0.76*** (2.13)
Diploma	0.93** (2.54)	0.11 (1.12)	0.65** (1.92)	0.70*** (2.02)
<b>Class</b>				
Social	2.20*** (9.02)	1.26** (3.51)	0.79** (2.21)	0.15 (1.16)
Human	0.27 (1.31)	0.76** (2.15)	0.66** (1.94)	0.26 (1.30)
Technical	1.37** (3.94)	0.68* (1.98)	0.35 (1.43)	0.11 (1.11)
Manager	1.55*** (4.70)	0.43 (1.54)	0.15 (1.16)	-0.14 (0.87)
Middle Class	0.06 (1.07)	-0.48 (0.62)	0.35** (1.42)	0.15 (1.16)
Government Sector	-0.36 (0.69)	-0.15 (0.86)	0.01 (1.01)	0.09 (1.09)
<b>Other Social Bases</b>				
No Religion	0.24 (1.27)	0.49** (1.63)	0.28 (1.32)	0.43 (1.53)
English Speaking Country	0.46 (1.59)	0.24 (1.27)	0.49 (1.05)	0.10 (1.10)
<b>Political Orientation</b>				
Political Ideology	0.57 (1.76)	1.45** (4.26)	0.64** (1.90)	1.38*** (3.96)
Other Party	1.51*** (4.51)	0.52 (1.68)	0.74** (2.10)	0.92*** (2.50)
Labor Party	0.59** (1.80)	-0.32 (0.72)	0.36** (1.43)	0.46*** (1.58)
Null Model	664.68	920.88	1875.05	2723.86
Full Model	567.47	794.79	1772.78	2465.27
L <sup>2</sup>	97.21	126.09	102.27	258.58
df	20	20	20	20
% of model fitted	0.15	0.14	0.05	0.09
Dependent Variable	74	114	318	634
n	2466	2438	2392	2324

Notes: Odds ratios are shown in parenthesis. Dependent variables are membership and potential membership of environmental groups. Independent variables as per Model 4, less residential location. 1990 and 1993 AES samples are combined, and divided into pre and post WWII sub samples.

Sources: Combined 1990 and 1993 Australian Electoral Studies

**Table 7.11: Logistic Regression (Estimates) Odds Ratios for Age Effects on Value Orientations.**

	Postmaterialists		Materialists	
	1990	1993	1990	1993
<b>Generation Model</b>				
Generation X (1960 +)	0.10 (1.10)	0.27* (1.30)	-0.34** (0.71)	-0.29** (0.75)
Baby Boomers (1946-59)	-0.09 (0.91)	0.13 (1.13)	0.03 (1.03)	-0.22* (0.80)
Pre World War II (1900-45 reference)	-	-	-	-
L Square (null-full model)	1.15	3.28	7.12	6.43
df	2	2	2	2
p	ns	ns	0.02	0.04
<b>'15 Year' Cohort Model</b>				
Cohort 1 (1973-75)	-	0.55 (1.74)	-	0.98* (2.65)
Cohort 2 (1966-72)	0.57** (1.76)	-0.29 (0.75)	-0.32 (0.73)	0.26 (1.30)
Cohort 3 (1951-65)	0.22 (1.24)	-0.19 (0.83)	-0.17 (0.84)	0.29 (1.33)
Cohort 4 (1936-50)	0.06 (1.06)	-0.04 (0.96)	0.00 (1.00)	0.35* (1.42)
Cohort 5 (1921-35)	0.19 (1.20)	0.12 (1.13)	0.06 (1.06)	0.02 (1.02)
Cohort 6 (1900-20 reference)	-	-	-	-
L Square (null-full model)	5.31	6.17	5.35	11.59
df	4	5	4	5
p	ns	ns	ns	0.04
<b>'10 Year' Cohort Model</b>				
Cohort 1 (1973-75)	-	0.58 (1.79)	-	0.88* (2.42)
Cohort 2 (1966-72)	0.41* (1.50)	-0.26 (0.77)	-0.31 (0.73)	0.17 (1.19)
Cohort 3 (1956-65)	-0.12 (0.89)	-0.26 (0.77)	-0.29* (0.75)	0.18 (1.23)
Cohort 4 (1946-55)	-0.02 (0.98)	0.01 (1.01)	0.10 (1.10)	0.29* (1.34)
Cohort 5 (1936-45)	0.17 (1.18)	-0.01 (0.99)	-0.14 (0.87)	0.19 (1.21)
Cohort 6 (1926-35)	-0.05 (0.95)	0.25 (1.28)	0.10 (1.10)	-0.18 (0.84)
Cohort 7 (1900-25 reference)	-	-	-	-
L Square (null-full model)	5.72	8.88	10.57	13.12
df	5	6	5	6
p	ns	ns	ns	0.04
<b>'Decade' Model</b>				
Aged (18-19)	1.80*** (6.04)	-0.66 (0.52)	-0.63 (0.53)	-0.36 (0.70)
Aged (20-29)	0.22 (1.24)	0.24 (1.27)	-0.36* (0.70)	-0.18 (0.83)
Aged (30-39)	0.27 (1.30)	0.27 (1.30)	-0.08 (0.92)	-0.22 (0.80)
Aged (40-49)	-0.10 (0.90)	0.00 (1.00)	0.02 (1.02)	-0.27* (0.76)
Aged (50-59)	0.41 (1.50)	0.04 (1.04)	-0.07 (0.93)	-0.14 (0.87)
Aged (60-69)	0.10 (1.10)	-0.04 (0.96)	0.12 (1.12)	0.09 (1.09)
Aged (70+ reference)	-	-	-	-
L Square (null-full model)	16.77	5.66	9.02	7.14
df	6	6	6	6
p	0.01	ns	ns	ns
n	258	419	508	629

Notes: Odds ratios are reported in parenthesis. 'ns' represents model not significant at p<0.05.

Sources: 1993 National Social Science Survey; 1990 & 1993 Australian Electoral Studies

**Table 7.12: Logistic Regression Estimates (Odds Ratios) for Predictors of Environmental Group Membership by Gender (AES)**

	Membership		Potential Membership	
	Male	Female	Male	Female
<b>Intercept</b>	-6.09	-5.29	-3.65	-4.23
<b>Father's Class</b>				
Social	1.06** (2.89)	0.91* (2.47)	0.15 (1.16)	0.89** (2.44)
Human Services	-0.59 (0.55)	0.68 (1.98)	0.33 (1.40)	-0.12 (0.89)
Technical	0.55 (1.72)	0.46 (1.58)	0.47** (1.61)	0.30 (1.35)
Manager	0.62** (1.86)	-0.01 (0.99)	0.06 (1.06)	0.23* (1.26)
Middle Class	0.22 (1.25)	0.40 (1.48)	-0.09 (0.91)	0.19 (1.21)
<b>Cohorts</b>				
18-19	-0.15 (0.86)	1.51* (4.53)	1.80*** (6.06)	2.24*** (9.39)
20-29	-0.10 (0.90)	-0.37 (0.69)	0.61** (1.84)	1.81*** (6.12)
30-39	0.09 (1.10)	0.86* (2.36)	0.81*** (2.25)	1.70*** (5.48)
40-49	0.27 (1.31)	0.79 (2.20)	0.48** (1.61)	1.40*** (4.06)
50-59	0.43 (1.53)	0.36 (1.44)	0.24 (1.28)	1.04*** (2.84)
60-69	0.24 (1.27)	0.92* (2.51)	0.20 (1.23)	0.79** (2.20)
<b>Value Orientation</b>	1.43*** (4.20)	0.91** (2.48)	1.03*** (2.81)	1.26*** (3.52)
<b>Education</b>				
Degree	0.62** (1.87)	0.76** (2.14)	0.55** (1.74)	0.80*** (2.23)
Diploma	0.83 (2.29)	0.68** (1.97)	0.68*** (1.97)	0.64*** (1.89)
<b>Class</b>				
Social	1.73*** (5.63)	1.23** (3.43)	0.03 (1.03)	0.86** (2.38)
Human	0.76 (2.12)	0.55 (1.74)	0.24 (1.28)	0.51** (1.66)
Technical	0.65 (1.91)	1.29** (3.65)	0.10 (1.11)	0.67** (1.96)
Manager	0.89** (2.43)	0.73* (2.07)	0.07 (1.08)	-0.19 (0.82)
Middle Class	-0.45 (0.63)	-0.23 (0.79)	0.17 (1.18)	0.26** (1.30)
Government Sector	-0.55* (0.58)	-0.16 (0.85)	0.01 (1.01)	0.01 (1.02)
<b>Other Social Bases</b>				
No Religion	0.17 (1.19)	0.69** (1.99)	0.22 (1.25)	0.60*** (1.82)
English Speaking Country	0.19 (1.21)	0.29 (1.33)	0.10 (1.11)	0.04 (1.04)
<b>Political Orientation</b>				
Political Ideology	1.83** (6.22)	0.70 (2.01)	1.32*** (3.75)	0.48 (1.62)
Other Party	0.78* (2.19)	0.98** (2.67)	0.86*** (2.36)	0.85*** (2.35)
Labor Party	0.32 (1.38)	-0.11 (0.90)	0.57*** (1.77)	0.33** (1.39)
Null Model	737.35	881.69	2292.48	2508.46
Full Model	630.98	753.40	2085.60	2148.93
Square	106.38	128.29	206.88	359.53
df	25	25	25	25
% of null fitted	0.14	0.15	0.09	0.14
Dependent Var n	85	106	449	512
n	2435	2549	2350	2443

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001. Odds ratios are reported in parenthesis. Dependent variables are membership and potential membership of environmental groups. 1990 and 1993 AES sample are combined, then divided on basis of gender.

Sources: Combined 1990 and 1993 Australian Electoral Studies

**Table 7.13: Religious Values and Nature for Environmental Groups and Demonstrators (per cent).**

<b>Nature is...</b>	<b>Members</b>	<b>Demonstrators</b>	<b>Sample</b>
important because it was created by God	15	20	21
is spiritual or sacred in itself	46	47	25
is important but not sacred	39	33	54

Source: National Social Science Survey 1993

## Chapter 8

### Social bases of environmentalism?

We may now return to the key questions posed in Chapter 1. Does environmentalism in Australia have well articulated 'social bases'? Are environmental issue-concerns and activism socially located in new classes, generations, status groups, and/or other social categories? The answer to these questions seems to be *yes and no*. The social bases of environmentalism are diverse and social location is a matter of degree. In other words, environmentalism in Australia is socially located, but only to a limited extent. The social location independent variables explain only a very small proportion of environmental concerns and activism. Further, the impact of social location varies for different aspects of environmentalism. Socio-structural accounts generally fare better in relation to the less inclusive 'behavioural' aspects of environmentalism, but they are of very limited utility for explaining the more inclusive 'attitudinal' aspects.

Another aim of this research has been to establish which of the most popular social base accounts -new class, status/lifestyle and generational - best explain the pattern of environmental concerns and activism in Australia. Once again, the answer is not straightforward, and depends upon the aspect of environmentalism that is considered. By and large, class and age/generational accounts fare poorly, but relative to other social location accounts they are the strongest, and have approximately equal explanatory power.

In order to summarise the relative impact of social location and other effects on different aspects of environmentalism, I present 'strength rankings' for all predictor variables on each aspect of environmentalism in Table 8.1.<sup>1</sup> While class and age

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<sup>1</sup> Ranking is achieved by showing the independent variables, or groups of independent variables that produce the four largest beta coefficients for the 'attitudinal' dependent variables, and the four largest improvements to the model fit for the 'behavioural' dependent variables. It should be noted that for father's class location, class location, education, employment sector, and partisanship, the ranking applies to *blocks of variables*. For example, the number 1 ranking for class location on membership refers to the impact of the group of respondent's class variables.

generally show the strongest social location effects, there are a number of variations in the results.<sup>2</sup>

[Table 8.1 about here]

- The popular ‘new class’ accounts claim that those located in ‘social and cultural’, or ‘human services’ professions are most likely to *join environmental groups*. These claims are to some degree supported here, as class ranks first from all predictors of environmental group membership. This may, as some theorists suggest, reflect the specific interests and orientations of these class-type categories. Another reason that certain professional groups emerge as stronger supporters of environmental groups, may have more to do with occupational characteristics. Professionals have more flexible employment and being less constrained in their working conditions have more time to spend on environmental and other group activities.

However, a strong qualification needs to be added to these findings. Class effects seem to be important predictors of environmentalism, but only *relative to other social location effects*. In general, the impact of occupational new class location on environmental support is *weak*.

- The ‘statist’ versions of the new class, advanced by authors such as Mattausch (1989), fare even worse. With the exception of public sector employees who are slightly more likely to participate in environmental protests than those employed elsewhere, employment sector has no detectable impact upon environmental support in Australia.

- Attempts to link environmental support with a new, tertiary educated ‘new class’ (for example, Eckersley 1989, Rootes 1995) are not supported by the Australian data. While highly educated people are slightly more sympathetic toward environmentalism, the impact of education is generally weak. Nevertheless, some caution is necessary in drawing such conclusions as this research examines only

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<sup>2</sup> The discussion of the findings draws upon the results reported in previous chapters, as well as the rankings shown in Table 8.1



differences in *level* of education. It is possible that it is not tertiary education *per se* that differentiates environmental support, but type of education. An empirical examination of environmental support by tertiary disciplines may well yield rather different results. I tend to agree with Rootes (1995) that support for environmentalism may be stronger among graduates of the more 'radical', arts and humanities disciplines. However, the wisdom of calling this a class effect is questionable.

- Generally, the weakness of class based support for environmental concerns and new politics should not be surprising, as it mirrors the declining importance of social class as a determinant of conventional (old) political behaviour (for example, see Franklin et al 1992, Clark et al 1993). It also confirms the class-less nature of new social movements (for example, see Cohen 1985, Pakulski 1993a).

- Surprisingly, age and generations also have only a limited impact on most aspects of environmentalism. In fact, age effects are entirely absent for environmental group membership, and participation in demonstrations. This is an important finding, as previous studies show that the young tend to be more supportive of environmental groups (for example, Van Liere and Dunlap 1980, Watts and Wandesforde-Smith 1981, Inglehart 1990a, 1990b, Eyerman and Jamison 1991, Abramson and Inglehart 1992, Inglehart and Abramson 1994). Again, there is some variation in the impact of age on different aspects of environmentalism. While there are no significant age effects for the variables measuring the highest levels of commitment to environmentalism (group members and demonstrators), younger people are more likely to consider joining and to approve of environmental groups, and to sympathise with environmental issue concerns. But once again, these age effects are of moderate strength only in relation to other social location effects.

- There is little evidence to suggest that environmentalism is generationally located in any consistent way. The only apparent generational difference is a very modest one between those born before, and after the Second World War. As noted above, this seems to be in line with Mannheim's (1972) suggestion that the strength of

generational articulation may vary, and that this variation may reflect different historical factors and cultural circumstances.

- Perhaps less surprisingly, gender differences are apparent. Women are more likely than men to be concerned about environmental issues, and to feel favourably toward environmentalists. They are also more likely to participate in environmental protest activities. More surprisingly, gender based differences in environmental support seem to underlie some social location effects. As suggested in Chapter 3, gender differences may be theorised in terms of status, or as symptoms of a new gender cleavage (see Hampel et al 1995).

- Among the other 'minor' social location factors, religiosity proves to be the most consistent (although weak) predictor of environmental support. Non-religious persons are generally more sympathetic toward environmentalism. This may support the link between environmentalism and secularism, or as suggested above, it may mean that environmental supporters tend to hold non-conventional religious beliefs. After all, the survey results show that many supporters see nature as sacred in its own right, in line with Easthope and Holloway's (1989) contention that environmentalists attribute sacred or spiritual qualities to 'wilderness'.

- Residential location has some impact upon environmental support, although in this respect the results differ somewhat from the outcomes of European studies of environmental groups. In Australia, big city dwellers are more sympathetic toward environmentalism, although 'suburbanites' are actually *less likely to join environmental groups* than those living in the country. As argued above, this may reflect the increased involvement of the Australian rural population in environmental groups such as Landcare and Greening Australia. Another possibility is that environmental groups in Australia focus upon different issues than their European counterparts. For example, urban concerns, such as air pollution and the preservation of historic buildings, are relatively less important in Australia than in Europe and the United States. However, given the results of previous research, and given the

popular perceptions of environmental supporters as urban dwellers, it is surprising that stronger urban effects are not apparent here.

- Notwithstanding the relative weakness of social location effects, this research shows that postmaterialist, professionals, who are high consumers of 'culture' during adolescence, are most likely to be *environmental group members*. This seems to add empirical weight to the argument advanced by Crook et al (1992:146) who suggest that the support bases of new social movements "are contingent rather than structurally determined...socio-cultural rather than socio-economic, and...related to consumption and lifestyle rather than to production". The results imply that support for environmental groups stems from 'intellectual' status categories, rather than a (new) class, or younger generation(s). They also indicate that intellectuals are as heavily involved in new political activities as they have been in conventional politics.

- Finally, the findings indicate that the support base of *environmental groups* seems to be more clearly circumscribed than the social base of *environmental concerns*. However, the inconsistent and generally weak impact of new class, age/generation, and education also implies that support for environmentalism tends to cross cut traditional political cleavage lines. Such findings fit Feher and Heller's (1984:35-36) notion of the environmental movement as "fluid and dynamic", with "no predefined space", and as flowing "over the whole 'surface' of society in search of supporters".

### **If social location is not important, what is?**

Some non-social location variables show more promise. For example, postmaterialists are consistently more environmentally sympathetic than materialists, especially in relation to 'behavioural' aspects of environmentalism. Inglehart's (1990a, 1990b) suggestions that postmaterialists are more supportive of environmentalism seems to hold in Australia. Yet, as seen above, another part of Inglehart's account proves less successful - generational location offers little explanatory mileage. Inglehart's argument that younger generations are more likely to support environmentalism because they are more postmaterialist, is not supported by

the data. Not only are generational differences in environmental support weak, *postmaterialism is not differentiated according to age*. Therefore, differences in age based support for environmentalism are not due to generational shifts in value priorities. This is a further indication that life cycle interpretations of the modest age differences shown above may be more appropriate than generational explanations.

It is also interesting to note that a 'left' placement on the left-right political ideology scale is a reasonably consistent predictor of environmentalism. Some argue that the very meaning of the 'left' has been changing, and that the left-right political cleavage now includes new sets of political concerns, such as environmentalism (for example, Inglehart 1984, Inglehart and Rabier 1986, Kitschelt and Hellemans 1990). The results lend some support to such claims. While a 'left' association with environmentalism is not necessarily an indication of radicalism, it does seem to imply that the traditional content of the left-right ideological cleavage is changing.

Political partisanship is consistently the strongest predictor of the 'attitudinal' aspects of environmentalism, although it is less important for 'behavioural' aspects. Such a finding is, of course, not surprising. The green parties in Australia have grown out of the broader environmental movement, while the Australian Democrats have also cultivated strong green links. More surprising are relatively strong links between environmental supporters and Labor partisans. The 'Michigan Model' of politics provides one explanation for this: if the "political thought and action" of partisans is guided by party spokespeople and leaders (Miller 1976:23), environmental support should be higher among Labor partisans than Coalition supporters, due to the pro environmental stance adopted by the ALP over the last decade or more.

In summary, new politics, especially environmental new politics seems to defy the old 'social base' paradigm. It floats through a variety of social locations and appears to be patterned according to value orientations and partisan preferences to a greater extent than by standard socio-structural factors.

### **Implications for political sociology**

By demonstrating that the overall utility of social base accounts for explaining environmental concerns and activism is poor, this research raises a number of questions about the theoretical foundations of political sociology. The weakness of social location effects provides fuel for the more radical critics of traditional sociological explanations of politics, and for more 'culturalist' accounts. Social base effects are not strong enough to repel the attacks of critics who posit the decline of structural determinants (for example, Franklin et al 1992) or even the 'end of the social' (see Featherstone 1987). Environmentalism, like other aspects of the new politics, appears to be relatively detached from the 'old' social-structural bases of politics and affected to a greater extent by socio-cultural factors.

This has already led to a revival of 'culturalist' accounts (for example, Gibbins 1989). Commentators, such as Dalton (1988), may be correct in suggesting that new politics is issue-based rather than structurally located. He points out that as "issue-group cleavages are more difficult to institutionalise or 'freeze' via social group identifications linked to mass organisations, they may not be as stable" (1988:175).<sup>3</sup> Another possibility is that the weakness of social base effects indicates a state of flux. The support base of environmentalism shifts according to the issues currently in vogue, especially in response to the influence of the mass media. This suggestion has been found in some media studies (for example, Hansen 1993). Others, such as Papadakis (1993:199) suggest that environmentalism "has become an integral part of the political culture". If he is correct, support for environmental new politics may prove to be as shifting and fluid as the support base of conventional politics in modern Western democracies. Given this fluid and shifting nature of environmental support, questions arise as to the stability and persistence of environmentalism as a political

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<sup>3</sup> The issue based nature of conventional politics is also noted by Franklin et al (1992): "In parallel to the decline in cleavage politics, all the countries we have studied have seen an apparent rise in issue voting...there are hints at several points in the country studies that, if all the issues of importance to voters had been measured and given their due weight, then the rise of issue voting would have compensated more or less precisely for the decline in cleavage politics" (1992:399-400). The rise in the importance of issues is therefore not only confined to new politics.

issue. Perhaps, as some analysts suggest, environmental concerns, groups and green parties will prove to be transient phenomena.

### **The future of environmentalism**

In this section I offer some more speculative remarks relating to the future of environmentalism. If environmental support is driven by issue concerns, other problems arise. A point is reached where popular support for the environment reaches its peak. After this it becomes increasingly difficult to mobilise mass support on environmental issues alone. Environmental mobilisations may wane as the number and media profile of environmental 'crises' decline. When threatened by destruction or extinction, areas of spectacular scenic value and exotic flora and fauna become powerful and emotive mobilising images in visual and print media. In such cases they easily trigger concerns and mobilise mass support. But with recent growth in environmental protection (for example, the extension of World Heritage areas and National Parks), the source of potential 'crises' may diminish, and their mass mobilising potential may decline.

One may also speculate that environmentalism as a set of political issues is being gradually absorbed by the large political parties in Australia. The Australian Labor Party has courted the environmental movement for more than a decade, and in the 1996 federal election campaign even the previously anti-environmental Coalition sought to capture the green vote. The Green parties are also making a bid for greater political representation in Federal politics, while at the same time distancing themselves from the Australian Democrats, the other 'new politics' party. This indicates that environmental concerns have become 'mainstream' - a process that seems to be reflected in their weakly articulated social bases and their 'floating nature'. A serious failure by the Greens could mean their gradual exit from the political arena, or lead to a much touted amalgamation of the Greens and Australian Democrats. Alternatively, success for the Greens may herald the beginning of a true multi-party system in Australia, at least in the Senate. This may further 'mainstream'

environmental issues and further detach them from the traditional social bases.

Finally, green success in representative politics may also open a divide between green parties and the environmental movement. Some tensions between the two have already been noted by political commentators.

### **Future research**

New theoretical ground needs to be broken before a better understanding of the support base of environmental new politics is achieved. Some hints as to the nature of some potential explanations appear in the results reported here. As shown above, consumption of high culture emerges as an indicator of environmental support, suggesting that environmentalism may be related to lifestyle. This would support the popular accounts of environmentalism that link it with specific subcultures and alternative lifestyles. It may prove fruitful to explore further the relationship between environmentalism, lifestyle, and cultural consumption. Such status-consumption based accounts could prove more successful in explaining the new political configurations emerging in advanced Western societies (see also Crook et al 1992).

Another important area that requires further research relates to education. As suggested above, theorists such as Rootes (1995) argue that tertiary education is an important determinant of environmental activism, particularly among certain disciplines such as the arts and humanities. An exploration of this area may well uncover certain nuances in education-based support for environmental new politics. Reference to the importance of *type* of education is made in Chapter 4. Further research in this area may help to clarify the relationship between education and environmental support.

The importance of issue based politics as suggested by Dalton (1988), and Franklin et al (1992), also requires more systematic and rigorous research. If issues 'flow across' the social structure, why are some issues more important than others, and how do they become important? While the major parties largely control the conventional political issue agenda, new political issues, such as environmental

issues, often enter conventional politics due to pressure from 'outside' the conventional political sphere: from protest groups. But does this merely reflect the influence of new social movements, or does it signal that conventional politics is changing, and becoming more open to new political issues? If it is, the divide between 'old' and 'new' politics may be narrowing or even merging. As conventional political parties lose their stable bases of support, they are forced to try and accommodate a diversity of political issues, including the new political issues.

Further, if issues are the driving force of new politics, are concerns over issues held prior to joining environmental groups, and participating in environmental protest activities, or are these concerns amplified in the process of joining/participating? Probably both, however, a better understanding of the nature this process may help to explain why people become active in environmental politics.

Another area of interest is the degree to which environmental social movements, groups and organisations impact upon the political attitudes and behaviour of their supporters. Do they operate in a similar manner to conventional political parties, as hypothesised in the Michigan model? Possibly, members and participants in environmental organisations have similar qualities to political partisans, in that they look to the group, or organisation for guidance on political issues. This tendency to 'follow' should be curtailed, to an extent, by the higher levels of education of environmentalists, although in Australia, as noted above, education has a rather modest impact upon environmental support.

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This research has shown that the classic 'social base' accounts of politics, even the modified 'new class' accounts are of very limited use for explaining environmental new politics in Australia. While calling for the abandonment of such explanations may be premature, it seems appropriate to recognise that they no longer deserve pride of place in political sociology. It is time to explore other possibilities, perhaps along the lines of lifestyle/consumption categories, and to undertake a more detailed examination of issue-based support for 'new' and 'old' politics. Should this occur,



social base accounts may come to be seen as supplementary rather than primary explanations in future sociological studies of politics.

**Table 8.1: The Relative Impact of Social Base and Other Effects on Environmentalism**

	Attitudinal Aspects			Behavioural Aspects			
	Issues	Approval of Groups	Feelings	Potential Members	Members (AES)	Members (NSSS)	Protesters
<b>Social Base</b>							
Father's Class	4	-	4	-	-	-	-
Father's Education	-	n/a	-	n/a	n/a	3	-
Class Location	4	4	2	-	1	-	-
Age/Generation	3	3	-	1	-	-	-
Education	-	-	-	3	-	-	-
Cultural Cons.	-	n/a	4	n/a	n/a	4	-
Gender	2	-	3	-	-	-	3
Religion	-	-	4	-	4	-	2
Ethnicity	n/a	-	n/a	-	-	n/a	n/a
Residential Area	-	4	-	-	3	-	-
Employment Sector	-	-	-	-	-	-	-
<b>Other</b>							
Values	-	2	-	2	2	1	1
Ideology	n/a	-	n/a	-	-	n/a	n/a
Partisanship	1	1	1	4	-	2	-

note: 'Attitudinal' rankings from Table 6.7, 'behavioural' rankings from Appendix B, Tables III-VIII.  
'Approval of Groups' refers to 1993 only.

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# Appendix A

**Table I: ASCO Groups as Predictors of Environmental Group Membership**

	Membership	Potential Membership	Membership	Potential Membership
	1990	1990	1993	1993
Managers	0.70 (2.01)	0.00 (1.00)	0.97** (2.63)	-0.04 (0.96)
Professionals	1.60*** (4.95)	0.89*** (2.43)	1.72*** (5.58)	0.96*** (2.61)
Para professionals	0.67 (1.97)	0.96*** (2.61)	0.88** (2.41)	0.63*** (1.87)
Clerks	0.14 (1.15)	0.52*** (1.68)	0.17 (1.18)	0.29** (1.33)
Sales	-0.51 (0.60)	0.23 (1.25)	-0.80 (0.45)	0.49** (1.63)
Null model	527.15	2066.65	872.99	2260.69
Full model	500.93	2019.18	814.10	2215.77
L2	26.21	47.47	58.89	44.91
df	5	5	5	5
dependent var n	58	428	107	448
n	2037	1979	2388	2281

Notes: Odds ratio=exp(parameter estimate). Parameter estimates included in parenthesis  
Occupational Groups are classified according to Australian Standard Classification of  
Occupations Major Groups (1986).  
Full category titles are: Managers and Administrators; Professionals; Para-professionals; Tradespersons; Clerks; Salespersons  
and Personal Service Workers. Reference category: Plant Machine Operators, and Drivers; Labourers and Related Workers.

Sources: 1990 and 1993 Australian Electoral Studies

**Table II: Kriesi Class Model as Predictors of Environmental Group Membership**

	Membership	Potential Membership
Traditional Professionals	3.75*** (42.52)	0.51 (1.66)
Farmers	1.47** (4.34)	-0.24 (0.78)
Social and Cultural	1.49*** (4.43)	1.09*** (2.97)
Administrative	0.49 (1.63)	0.04 (1.05)
Technical Specialists	1.36** (3.89)	0.81** (2.27)
Protective Services <sup>a</sup>	-	1.03* (2.80)
Craft Professionals	0.35 (1.41)	0.94*** (2.55)
Middle	-0.03 (0.97)	0.42** (1.52)
		-
Null model	527.15	2066.65
Full model	492.16	2013.00
L2	34.98	53.65
df	7	8
dependant n	58	428
n	2037	1979

Notes: <sup>a</sup>There are no protective services workers among actual members of environmental groups. Classes coded in a manner following Kriesi (1989) from ASCO Unit Groups: Traditional professionals: medical practitioners and lawyers, Farmers and farm managers; Social and Cultural professionals: Medical services professionals (excluding medical practitioners), teachers, University and CAE teachers, social workers, counsellors, Ministers of Religion, Artists and related professionals, psychologists, education researchers, other social scientists, librarians, nurses; Administrative and Commercial Specialists: Managers (excluding farmers and farm managers), Managing Supervisors, Economists, Accountants, Public Relations Officers, Personnel Specialists, Other Business Professionals, Technical Specialists. Natural Scientists, Architects, Engineers, Computing Specialists, Miscellaneous Professionals, Mathematicians, Statisticians, Actuaries, Other Professionals, Craft Specialists: Medical and Science Technical Officers, Engineering & Building Associates, Air & Sea Transport Workers; Middle: Clerks, Sales & Personal Service Workers; Working class (reference category): Trades, Plant and Machine Operators, and Drivers; Labourers and Related Workers

Source: 1990 Australian Electoral Study

Table III: Brint Class Models as Predictors of Environmental Group Membership

	Membership	Potential Membership	Membership	Potential Membership
	1990	1990	1993	1993
Social Professionals	2.29*** (9.87)	1.09*** (2.97)	2.18*** (8.84)	1.10*** (3.00)
Human Services	1.23** (3.42)	1.13*** (3.09)	1.24*** (3.45)	0.87*** (2.41)
Technical	1.02** (2.77)	0.58** (1.78)	1.56*** (4.75)	0.75*** (2.11)
Managers	0.70 (2.01)	0.00 (1.00)	0.97** (2.63)	-0.04 (0.96)
Middle	-0.01 (0.99)	0.47*** (1.60)	-0.11 (0.89)	0.37** (1.44)
Null model	527.15	2066.65	872.99	2260.69
Full model	497.72	2018.76	817.60	2217.87
L2	29.42	47.89	55.39	42.82
df	5	5	5	5
dependant n	58	428	107	448
n	2037	1979	2388	2281

Notes: Coding for 1990. Technical Professionals: Natural scientists, engineers, surveyors, computing professionals, miscellaneous professionals (excluding librarians) mathematicians, statisticians and actuaries, other professionals, economists, accountants, public relations officers, other business professionals, technical officers (medical science, engineering, and air and sea transport), Social & Cultural Professionals: Medical practitioners and lawyers, university and CAE teachers, Artists and related professionals, education researchers, other social scientists, architects, ministers of religion; Human Services Professionals: Health Diagnosis and Treatment (excluding medical practitioners), teachers, social workers, librarians, counsellors, nurses, psychologists, Middle Class Clerks, Sales & Personal Service Workers, Police, Miscellaneous para-professionals, Working class (reference category): Trades, Plant and Machine Operators, and Drivers; Labourers and Related Workers  
Coding for 1993. Technical professionals: scientists, building professionals, engineers, and business professionals, medical and science technical officers and technicians, engineering and building technical officers and technicians, air and sea transport technical workers; Social and Cultural professionals: university and TAFE teachers and instructors, arts and health professionals, health diagnosis and treatment professionals, Human Services professionals: teachers, social workers, nurses, police and other para-professionals.  
Managers: all managers and managing supervisors, Middle class Clerks, Sales & Personal Service Workers; Working class (reference category): Trades, Plant and Machine Operators, and Drivers; Labourers and Related Workers.

Sources: 1990 and 1993 Australian Electoral Studies

**Table IV: Ehrenreichs' Class Model as a Predictor of Environmental Group Membership**

	Membership	Potential Membership
	1993	1993
Petit Bourgeois	0.82** (2.27)	0.11 (1.12)
Bourgeoisie	0.88** (2.43)	0.16 (1.17)
PMC1	0.81** (2.24)	0.43** (1.53)
PMC2	1.51*** (4.52)	0.87*** (2.38)
Middle	-0.17 (0.84)	0.34** (1.40)
Null model	872.99	2260.69
Full model	833.95	2233.13
L <sup>2</sup>	39.04	27.56
df	5	5
dependant n	107	448
n	2388	2281

Notes: Classes are coded from ASCO Minor groups. Classes: Bourgeois: self employed with two or more employees; Petite Bourgeois: self employed with none or one employee; PMC1: managers, scientists, building professionals and engineers, miscellaneous professionals; PMC2: health diagnosis and treatment professionals, school teachers, other teachers and instructors, artists and related professionals; Middle: clerks and sales, personnel service workers. Working class of trades, semi-skilled, unskilled is reference category.

Source: 1993 Australian Electoral Study

**Table V: Goldthorpe Class Model as Predictor of Environmental Group Membership**

	Membership	Potential Membership
	1993	1993
I	1.77*** (.587)	0.82*** (.227)
II	1.32*** (.374)	0.53*** (.169)
III	0.01 (.101)	0.38** (.146)
IV	0.89** (.243)	-.07 (.093)
V	0.54 (.172)	-.06 (.094)
Null model	872.99	2260.69
Full model	819.40	2229.85
L <sup>2</sup>	53.59	30.84
df	5	5
dependant n	107	448
n	2388	2281

Notes: Goldthorpe classes are coded to Goldthorpe (1982) 12 class model, and reduced to 7 classes.  
 Class I: legislators and government officials, general managers, specialist managers, natural scientists, building professionals and engineers, health diagnostic and treatment practitioners, university and CAE teachers, TAFE teachers, extra systemic-teachers and instructors, social professionals, business professionals, miscellaneous professionals.  
 Class II: Managing supervisors (sales and service, and other business), school teachers, artists and related professionals, para-professionals, air and sea transport technical workers, registered nurses, police, miscellaneous para-professionals.  
 Class IIIA: clerks, stenographers and typists, receptionists, telephonists, and messengers, salespersons, tellers, cashiers, and ticket salespersons. Class IIIB: personal service workers. Class IIIA & IIIB are combined.  
 Class IVA: self employed tradespeople with employees. Class IVB: self employed tradespeople without employees. Class IVC: farmers and farm managers. Class IVA, IVB, IVC are combined.  
 Class V: medical and science technical officers and technicians, engineering and building associates and technicians. Class VI: skilled manual workers (non self-employed tradespeople).  
 Class VIIA: semi-skilled and unskilled workers (not including agricultural workers). Class VIIB: agricultural labourers and related workers. Classes VI, VIIA and VIIB are the working class reference group.

Source: 1993 Australian Electoral Study

**Table: VI Logistic Regression Estimates (odds ratios) of Social Location on Membership of Environmental Groups: Comparison of Unweighted and Weighted Data.**

	Unweighted Data	Weighted Data
Intercept	-5.10	-5.12
Father's Class		
Social	0.26 (1.30)	-0.33 (0.71)
Human Services	0.09 (1.10)	0.08 (1.09)
Technical	0.50 (1.66)	0.39 (1.48)
Manager	0.44* (1.56)	0.36 (1.43)
Middle Class	0.41 (1.50)	0.43 (1.55)
Age	-0.002 (0.998)	-0.002 (0.998)
Female	0.43** (1.54)	0.45** (1.54)
Value Orientation	1.00** (2.72)	1.22** (3.40)
Degree	0.70** (2.02)	0.64** (1.89)
Diploma	0.51* (1.67)	0.24 (1.27)
Class		
Social	1.54*** (4.64)	1.45** (4.25)
Human	0.65* (1.90)	0.70 (2.01)
Technical	0.96** (2.60)	1.04** (2.82)
Manager	0.89** (2.43)	0.84** (2.31)
Middle Class	-0.35 (0.71)	-0.40 (0.67)
Government Sector	-0.32 (0.73)	-0.34 (0.71)
Other Bases		
Urban	-0.34 (0.71)	-0.40 (0.68)
Suburban	0.34 (1.41)	0.29 (1.34)
No Religion	0.43* (1.53)	0.57** (1.77)
English Speaking	0.40 (1.50)	0.51* (1.66)
Country		
Political Ideology	1.14** (3.13)	1.14** (3.13)
Other Party	1.11** (3.03)	1.00** (2.72)
Labor	0.05 (1.05)	-0.03 (0.97)
Null Model	1103.24	872.99
Full Model	963.02	757.03
L <sup>2</sup>	140.21	115.96
df	23	23
% of null fitted	0.13	0.13
dependent var N	135	107
n	3023	2388

Note: odds ratios shown in parenthesis

Source: 1993 Australian Electoral Study



# Appendix B

**Table I: Bivariate Analysis of Environmental Group Membership (percentages)**

Variable	Members	Have Considered Joining	Not Considered Joining	Never Join	N
<b>Fathers Class</b>					
Social & Cultural Professionals	16	35	35	15	(55)
Human Service Professionals	5	28	51	16	(43)
Technical Professionals	4	32	49	14	(93)
Managers	3	21	58	19	(484)
Middle Class	3	24	59	13	(222)
Workers	2	19	64	15	(964)
<b>Respondent's Class</b>					
Social & Cultural Professionals	15	32	44	8	(59)
Human Service Professionals	6	37	45	12	(151)
Technical Professionals	5	25	60	11	(148)
Managers	4	16	63	17	(228)
Middle Class	2	24	61	13	(577)
Workers	2	18	63	18	(586)
<b>'Decade' Cohorts</b>					
18-19	0	37	47	16	(19)
20-29	3	28	57	12	(329)
30-39	4	29	59	8	(460)
40-49	2	24	60	14	(401)
50-59	2	15	63	20	(280)
60-69	4	12	61	23	(287)
70+	0	9	63	29	(182)
<b>Gender</b>					
Male	2	19	61	17	(971)
Female	3	23	59	14	(1010)
<b>Value Orientation</b>					
Materialist	1	15	65	19	(501)
Postmaterialist	8	36	44	11	(253)
Mixed	3	21	61	15	(1236)
<b>Education</b>					
Degree	8	38	44	10	(204)
Diploma	5	32	51	13	(200)
Other	3	22	60	16	(565)
No Post Secondary Education	1	16	65	18	(948)
<b>Employment Sector</b>					
Public	3	20	62	16	(1266)
Other	4	27	55	13	(498)
<b>Religiosity</b>					
Religion	2	19	62	16	(1740)
No Religion	6	37	44	13	(255)
<b>Country of Birth</b>					
English Speaking Countries	3	18	63	16	(188)
Australia, NZ and Other Countries	3	22	60	16	(1786)
<b>Political Orientation</b>					
Left	7	38	44	11	(280)
Middle	2	21	62	15	(882)
Right	2	17	64	17	(602)
<b>Political Party Identification</b>					
Coalition	2	15	64	20	(802)
Other	7	35	46	12	(224)
ALP	3	24	60	13	(895)
<b>Total</b>	<b>2.9</b>	<b>21.5</b>	<b>59.8</b>	<b>15.7</b>	

notes: n=2037

Source: 1990 Australian Electoral Study

**Table II: Logistic Regression Estimates (Odds Ratios) for Predictors of Environmental Group Membership (AES 1993).**

	Members -5 08	Potential Members -1 99
Intercept		
Father's Class		
Social	-0.34 (0.71)	0.38 (1.46)
Human Services	0.08 (1.08)	-0.12 (0.88)
Technical	0.32 (1.37)	0.26 (1.30)
Manager	0.32 (1.37)	0.16 (1.18)
Middle Class	0.45 (1.58)	0.07 (1.07)
Age	-0.004 (0.99)	-0.03*** (0.97)
Female	0.48** (1.61)	0.10 (1.10)
Value Orientation	1.22** (3.39)	1.10*** (3.01)
Higher Degree	1.31** (3.73)	0.77** (2.15)
Graduate Diploma	0.69 (2.00)	0.70** (2.01)
Bachelor Degree	0.44 (1.55)	0.76*** (2.14)
Diploma	0.25 (1.28)	0.77*** (2.16)
Class		
Social	1.35** (3.85)	0.18 (1.19)
Human	0.69* (2.00)	0.21 (1.23)
Technical	1.05** (2.86)	0.11 (1.11)
Manager	0.84** (2.31)	-0.08 (0.92)
Middle Class	-0.40 (0.67)	0.17 (1.19)
Government Sector	-0.35 (0.71)	-0.02 (0.98)
Urban Location	-0.42* (0.65)	0.23 (1.26)
Suburban	0.28 (1.33)	0.06 (1.06)
No Religion	0.58** (1.79)	0.18 (1.20)
English Speaking Country	0.54 (1.73)	0.22 (1.25)
Political Ideology	1.17** (3.22)	1.09*** (2.97)
Other Party	1.04** (2.83)	0.73 (2.08)
Labor	-0.05 (0.95)	0.52*** (1.68)
Null Model	872.99	2260.69
Full Model	753.42	2008.87
L2	119.58	251.82
df	25	25
% of null fitted	0.14	0.11
dependent var n	107	448
n	2388	2281

Notes: \* p<0.1 \*\* p<0.05 \*\*\* p<0.001  
Logistic regression estimates are reported. Odds ratios are shown in parenthesis. Dependent variable is membership of environmental groups.  
Independent variables as per Table 7.4, Chapter 7 For additional explanation see Chapter 5.

Source: 1993 Australian Electoral Study

**Table III: The Relative Explanatory Impact of Predictor Variables on Potential Environmental Group Membership (AES 1990).**

Model	Model df	L-Square	Difference Full less Test	Test Model df	p value	Rank Order
Full Model	21	231.74	-	-	-	
" less Fathers Class	16	223.38	8.36	5	. ns	
" less Age	20	198.76	32.98	1	<0.001	1
" less Gender	20	230.56	1.18	1	ns	
" less Values	20	201.18	30.56	1	<0.001	2
" less Education	19	221.55	10.19	2	<0.01	5
" less Present Class	16	223.18	8.56	5	ns	
" less Employment Sector	20	230.89	0.85	1	ns	
" less No Religion	20	218.13	13.61	1	<0.001	4
" less English Speaking	20	231.52	0.22	1	ns	
" less Political Ideology	20	226.29	5.45	1	<0.02	6
" less Party ID	19	215.51	16.23	2	<0.001	3

potential members n=428

n=1979

ns: not significant at p<0.05

**Table IV: The Relative Explanatory Impact of Predictor Variables on Potential Environmental Group Membership (AES 1993).**

Model	Model df	L-Square	Difference Full less Test	Test Model df	p value	Rank Order
Full Model	23	251.78	-	-	-	
" less Fathers Class	18	248.65	3.13	5	. ns	
" less Age	22	199.52	52.26	1	<0.001	1
" less Gender	22	251.13	0.65	1	ns	
" less Values	22	220.04	31.74	1	<0.001	2
" less Education	21	229.76	22.02	2	<0.001	3
" less Present Class	18	249.33	2.45	5	ns	
" less Employment Sector	22	251.76	0.02	1	ns	
" less Urban Location	21	248.71	3.07	2	ns	
" less No Religion	21	250.38	1.40	1	ns	
" less English Speaking	22	250.31	1.47	1	ns	
" less Political Ideology	22	239.32	12.46	1	<0.001	5
" less Party ID	21	232.23	19.55	2	<0.001	4

potential members n=448

n=2281

ns: not significant at p<0.05

**Table V: The Relative Explanatory Impact of Predictor Variables on Environmental Group Membership (AES 1990).**

Model	Model df	L-Square	Difference Full less Test	Test Model df	p value	Rank Order
Full Model	21	77.55	-	-	-	
" less Fathers Class	16	67.22	10.33	5	ns	
" less Age	20	77.55	0	1	ns	
" less Gender	20	74.95	2.6	1	ns	
" less Values	20	69.38	8.17	1	<0.01	2
" less Education	19	76.00	1.55	2	ns	
" less Present Class	16	64.75	12.8	5	<0.05	1
" less Employment Sector	20	77.42	0.13	1	ns	
" less No Religion	20	76.76	0.79	1	ns	
" less English Speaking	20	77.45	0.10	1	ns	
" less Political Ideology	20	74.58	2.97	1	ns	
" less Party ID	19	72.77	4.78	2	ns	

members n=58

n=2037

ns: not significant at  $p < 0.05$

**Table VI: The Relative Explanatory Impact of Predictor Variables on Environmental Group Membership (AES 1993).**

Model	Model df	L-Square	Difference Full less Test	Test Model df	p value	Rank Order
Full Model	23	116.45	-			
" less Fathers Class	18	112.80	3.65	5	ns	
" less Age	22	116.31	0.14	1	ns	
" less Gender	22	112.70	3.75	1	ns	
" less Values	22	105.34	11.11	1	<0.001	2
" less Education	21	112.07	4.38	2	ns	
" less Present Class	18	95.84	20.61	5	<0.001	1
" less Employment Sector	22	114.59	1.86	1	ns	
" less Urban Location	21	110.05	6.4	2	<0.05	3
" less No Religion	22	111.42	5.03	1	<0.05	4
" less English Speaking	22	113.22	3.23	1	ns	
" less Political Ideology	22	112.56	3.89	1	<0.05	5
" less Party ID	21	110.94	5.51	2	ns	

members n=107

n=2388

ns: not significant at  $p < 0.05$

**Table VII: The Relative Explanatory Impact of Predictor Variables on Environmental Group Membership (NSSS 1993).**

Model	Model df	L-Square	Difference Full less Test	Test Model df	p value	Rank Order
Full Model	23	87.32	-	-	-	
" less Fathers Education	22	81.70	5.62	1	<0.02	3
" less Fathers Class	18	84.04	3.28	5	ns	
" less Age	22	87.26	0.06	1	ns	
" less Gender	22	87.32	0	1	ns	
" less Values	22	71.48	15.84	1	<0.001	1
" Culture at Age 14	22	82.51	4.81	1	<0.05	4
" less Education	21	83.43	3.89	2	ns	
" less Present Class	18	83.62	3.70	5	ns	
" less Employment Sector	22	87.05	0.27	1	ns	
" Urban Location	21	82.95	4.37	2	ns	
" less No Religion	22	83.51	3.81	1	ns	
" less Party ID	21	80.28	7.04	2	<0.05	2

members n=170

n=1779

ns: not significant at p<0.05

**Table VIII: The Relative Explanatory Impact of Predictor Variables on Environmental Demonstrators (NSSS 1993).**

Model	Model df	L-Square	Difference Full less Test	Test Model df	p value	Rank Order
Full Model	23	67.53	-	-	-	
" less Fathers Education	22	67.13	0.4	1	ns	
" less Fathers Class	18	58.00	9.53	5	ns	
" less Age	22	67.48	0.05	1	ns	
" less Gender	22	60.86	6.67	1	<0.01	3
" less Values	22	55.60	11.93	1	<0.001	1
" Culture at Age 14	22	64.10	3.43	1	ns	
" less Education	21	64.69	2.84	2	ns	
" less Present Class	18	64.08	3.45	5	ns	
" less Employment Sector	22	64.79	2.74	1	ns	
" Urban Location	21	65.65	1.88	2	ns	
" less No Religion	22	60.14	7.39	1	<0.01	2
" less Party ID	21	64.04	3.49	2	ns	

protesters n=80

n=1779

ns: not significant at p<0.05

**Table IX: Logistic Regression Estimates (Odds Ratios) for Predictors of Environmental Group Membership and Demonstrators with Religion Variables.**

	Members		Demonstrators	
Intercept	-4.29	-4.64	-5.56	-6.11
Fathers Education (years)	0.07** (1.07)	0.07** (1.08)	0.03 (1.03)	0.03 (1.03)
Father's Class				
Social	-0.32 (0.73)	-0.45 (0.63)	0.67 (1.95)	0.63 (1.87)
Human Services	-0.61 (0.54)	-0.62 (0.54)	-0.83 (0.43)	-0.77 (0.46)
Technical	0.17 (1.18)	0.11 (1.12)	0.09 (1.09)	0.07 (1.08)
Manager	0.21 (1.23)	0.19 (1.21)	0.69** (1.99)	0.67** (1.94)
Middle Class	-0.04 (0.96)	-0.01 (0.99)	-0.17 (0.84)	-0.18 (0.83)
Age (years)	0.001 (1.00)	0.004 (1.00)	0.002 (1.00)	0.004 (1.00)
Female	-0.003 (1.00)	-0.04 (0.96)	0.68** (1.97)	0.63** (1.87)
Value Orientation (scale)	1.26*** (3.52)	1.17*** (3.23)	1.53*** (4.62)	1.47** (4.34)
Cultural Consumption at age 14 (scale)	1.16** (3.19)	1.07** (2.92)	1.35** (3.85)	1.27* (3.54)
Degree	0.41* (1.51)	0.43* (1.54)	0.44 (1.55)	0.46 (1.59)
Some Tertiary	0.41 (1.51)	0.37 (1.44)	0.60 (1.82)	0.60 (1.82)
Class				
Social	0.12 (1.13)	0.14 (1.15)	-0.32 (0.72)	-0.32 (0.72)
Human	0.39 (1.48)	0.36 (1.43)	-0.20 (0.82)	-0.23 (0.79)
Technical	0.44 (1.55)	0.51* (1.66)	-0.43 (0.65)	-0.39 (0.67)
Manager	0.12 (1.27)	0.13 (1.14)	0.16 (1.17)	0.20 (1.23)
Middle Class	-0.02 (0.98)	-0.06 (0.95)	-0.5 (0.61)	-0.52 (0.59)
Government Sector	0.10 (1.10)	0.10 (1.10)	0.47* (1.60)	0.47* (1.60)
Other Bases				
Urban Location	-0.35 (0.70)	-0.29 (0.75)	-0.62 (0.54)	-0.56 (0.57)
Suburban	-0.44** (0.64)	-0.38* (0.69)	-0.15 (0.86)	-0.06 (0.94)
No Religion	0.36** (1.43)	0.30 (1.35)	0.70** (2.01)	0.76** (2.13)
Other Party	0.71** (2.03)	0.56* (1.75)	0.43 (1.54)	0.26 (1.29)
Labor	0.37** (1.45)	0.32* (1.37)	0.47* (1.60)	0.42 (1.53)
Nature Sacred	-	0.89*** (2.43)	-	1.00*** (2.73)
Nature created by God	-	0.08 (1.09)	-	0.69** (1.99)
Null Model	1121.53	1121.53	652.63	652.63
Full Model	1034.21	1011.08	585.09	570.52
L2	87.32	110.45	67.53	82.11
df	23	25	23	25
% of null fitted	0.08	0.10	0.10	0.13
dependent var n	170	170	80	80
n	1779	1779	1779	1779

Source: National Social Science Survey 1993

**Table X: Logistic Regression Estimates (Odds Ratios) for Predictors of Environmental Group Membership (NSSS).**

	Model 2a	Model 2	Model 3a	Model 3	Model 4a	Model 4
Intercept	-3.97	-4.06	-3.95	-4.03	-4.22	-4.29
Fathers Education (years)	0.08** (1.08)	0.07** (1.07)	0.08** (1.08)	0.07** (1.07)	0.08** (1.08)	0.07** (1.07)
<b>Father's Class</b>						
Social	-0.28 (0.76)	-0.31 (0.73)	-0.29 (0.75)	-0.33 (0.72)	-0.27 (0.76)	-0.32 (0.72)
Human Services	-0.53 (0.59)	-0.55 (0.58)	-0.65 (0.52)	-0.66 (0.52)	-0.61 (0.54)	-0.61 (0.54)
Technical	0.22 (1.25)	0.21 (1.23)	0.20 (1.23)	0.19 (1.21)	0.18 (1.20)	0.17 (1.18)
Manager	0.21 (1.23)	0.21 (1.23)	0.18 (1.19)	0.18 (1.20)	0.21 (1.23)	0.21 (1.23)
Middle Class	-0.05 (0.95)	-0.04 (0.96)	-0.11 (0.99)	-0.009 (0.99)	0.00 (1.00)	-0.04 (0.96)
Age (years)	-0.002 (1.00)	-0.003 (1.00)	0.0001 (1.00)	-0.004 (1.00)	0.002 (1.00)	0.001 (1.00)
Female	-0.03 (0.97)	-0.08 (0.92)	0.02 (1.02)	-0.03 (0.97)	0.04 (1.04)	-0.003 (1.00)
Value Orientation (scale)	1.41*** (4.11)	1.36*** (3.90)	1.35*** (3.84)	1.29*** (3.63)	1.31*** (3.69)	1.26*** (3.52)
Cultural Consumption at age 14 (scale)	-	1.24** (3.45)	-	1.22** (3.39)	-	1.16** (3.19)
Degree	0.73*** (2.08)	0.62** (1.86)	0.50* (1.65)	0.39* (1.48)	0.52* (1.68)	0.41* (1.51)
Some Tertiary	0.63** (1.88)	0.59* (1.80)	0.46 (1.58)	0.41 (1.51)	0.46 (1.58)	0.41 (1.51)
<b>Class</b>						
Social			0.12 (1.13)	0.14 (1.15)	0.11 (1.11)	0.12 (1.13)
Human			0.40 (1.50)	0.38 (1.46)	0.42 (1.52)	0.39 (1.48)
Technical			0.40 (1.50)	0.39 (1.48)	0.46 (1.58)	0.44 (1.55)
Manager			0.01 (1.01)	0.03 (1.03)	0.10 (1.11)	0.12 (1.13)
Middle Class			-0.04 (0.96)	-0.07 (0.93)	0.01 (1.01)	-0.02 (0.98)
Government Sector			0.18 (1.20)	0.17 (1.18)	0.10 (1.11)	0.10 (1.10)
<b>Other Bases</b>						
Urban Location			-0.28 (0.75)	-0.31 (0.73)	-0.32 (0.73)	-0.35 (0.70)
Suburban			-0.42 (0.66)	-0.41** (0.66)	-0.45** (0.64)	-0.44** (0.64)
No Religion			0.42 (1.52)	0.41** (1.51)	0.36** (1.44)	0.36** (1.43)
Other Party					0.76** (2.14)	0.71** (2.03)
Labor					0.37** (1.45)	0.37** (1.45)
Null Model	1121.53	1121.53	1121.53	1121.53	1121.53	1121.53
Full Model	1061.47	1055.70	1046.67	1041.25	1039.02	1034.21
L2	60.06	65.83	74.87	80.28	82.51	87.32
df	11	12	20	21	22	23
% of null fitted	0.05	0.06	0.07	0.07	0.07	0.08
dependent var n	170	170	170	170	170	170
n	1779	1779	1779	1779	1779	1779

Source: National Social Science Survey 1993

**Table XI: Logistic Regression Estimates (Odds ratios) for Predictors of Environmental Demonstrators less Parent’s Cultural Consumption (NSSS).**

	Model 2a	Model 2	Model 3a	Model 3	Model 4a	Model 4
Intercept	-4.98	-5.04	-5.17	-5.24	-5.47	-5.56
Fathers Education (years)	0.03 (1.03)	0.02 (1.02)	0.03 (1.03)	0.02 (1.02)	0.03 (1.03)	0.03 (1.03)
Father’s Class						
Social	0.60 (1.83)	0.57 (1.77)	0.73 (2.08)	0.67 (1.95)	0.74 (2.10)	0.67 (1.95)
Human Services	-0.71 (0.49)	-0.71 (0.49)	-0.84 (0.43)	-0.86 (0.42)	-0.82 (0.44)	-0.83 (0.44)
Technical	0.15 (1.16)	0.14 (1.15)	0.11 (1.12)	0.08 (1.08)	0.12 (1.12)	0.09 (1.09)
Manager	0.60** (1.82)	0.60** (1.82)	0.63** (1.87)	0.62** (1.86)	0.69** (1.99)	0.69** (1.99)
Middle Class	-0.24 (0.78)	-0.24 (0.79)	-0.18 (0.84)	-0.18 (0.83)	-0.17 (0.84)	-0.17 (0.84)
Age (years)	-0.0006 (1.00)	-0.001 (1.00)	0.002 (1.00)	0.0006 (1.00)	0.003 (1.00)	0.002 (1.00)
Female	0.54** (1.71)	0.48** (1.62)	0.69** (1.99)	0.64** (1.90)	0.72** (2.05)	0.68** (1.97)
Value Orientation (scale)	1.70*** (5.45)	1.64*** (5.15)	1.60*** (4.93)	1.54*** (4.67)	1.58*** (4.86)	1.53*** (4.62)
Cultural Consumption at age 14 (scale)	-	1.22* (3.39)	-	1.35** (3.86)	-	1.35** (3.86)
Degree	0.72** (2.04)	0.58** (1.79)	0.56 (1.75)	0.44 (1.55)	0.57 (1.76)	0.44 (1.55)
Some Tertiary	0.79** (2.20)	0.73** (2.07)	0.66 (1.93)	0.59 (1.80)	0.67 (1.95)	0.60 (1.82)
Class						
Social			-0.34 (0.71)	-0.33 (0.72)	-0.33 (0.72)	-0.32 (0.73)
Human			-0.19 (0.83)	-0.21 (0.81)	-0.17 (0.84)	-0.20 (0.82)
Technical			-0.47 (0.63)	-0.46 (0.63)	-0.43 (0.65)	-0.43 (0.65)
Manager			0.07 (1.08)	0.10 (1.10)	0.14 (1.15)	0.16 (1.17)
Middle Class			-0.50 (0.61)	-0.54 (0.59)	-0.45 (0.64)	-0.5 (0.61)
Government Sector			0.54** (1.71)	0.53** (1.70)	0.48 (1.61)	0.47* (1.60)
Other Bases						
Urban Location			-0.52 (0.60)	-0.56 (0.57)	-0.59 (0.56)	-0.62 (0.54)
Suburban			-0.11 (0.90)	-0.09 (0.91)	-0.17 (0.85)	-0.15 (0.86)
No Religion			0.77 (2.16)	0.76** (2.14)	0.71 (2.03)	0.70** (2.01)
Other Party			-		0.49 (1.64)	0.43 (1.54)
Labor			-		0.46* (1.59)	0.47* (1.60)
Null Model	652.63	652.63	652.63	652.63	652.63	652.63
Full Model	609.48	606.53	592.04	588.59	588.53	585.09
L2	43.15	46.09	60.59	64.04	64.10	67.53
df	11	12	20	21	22	23
% of null fitted	0.07	0.07	0.09	0.10	0.10	0.10
dependent var n	80	80	80	80	80	80
n	1779	1779	1779	1779	1779	1779

Source: National Social Science Survey 1993



**Table XII: OLS Regression Estimates for Predictors of Environmental Issues Scale less Adolescent Cultural Consumption (NSSS).**

	Model 2a	Model 2	Model 3a	Model 3	Model 4a	Model 4
<b>Intercept</b>	0.70	0.70	0.70	0.70	0.67	0.66
<b>Social Background</b>						
Father's Education	0.00 (0.02)	0.001 (0.02)	0.001 (0.02)	0.00 (0.01)	0.00 (0.02)	0.00 (0.01)
Father's Class						
Social	-0.03 (-0.03)	-0.04 (-0.04)	-0.04 (-0.04)	-0.04 (-0.04)	-0.04 (-0.04)	-0.04 (-0.04)
Human Services	-0.02 (-0.02)	-0.02 (-0.02)	-0.03 (-0.02)	-0.03 (-0.02)	-0.02 (-0.02)	-0.02 (-0.02)
Technical	-0.03** (-0.05)	-0.03** (-0.05)	-0.03** (-0.05)	-0.03** (-0.05)	-0.03** (-0.05)	-0.03** (-0.05)
Manager	-0.03** (-0.07)	-0.03** (-0.07)	-0.03** (-0.07)	-0.03** (-0.07)	-0.02** (-0.05)	-0.02* (-0.05)
Middle Class	-0.03** (-0.06)	-0.03** (-0.06)	-0.02** (-0.06)	-0.02** (-0.06)	-0.02** (-0.05)	-0.02** (-0.05)
<b>Adolescent Socialisation</b>						
Age	-0.001 (-0.12)	-0.001*** (-0.12)	-0.001*** (-0.10)	-0.001*** (-0.10)	-0.001*** (-0.09)	-0.001*** (-0.09)
Female	0.05*** (0.16)	0.05*** (0.15)	0.05*** (0.15)	0.04*** (0.14)	0.05*** (0.15)	0.05*** (0.15)
Value Orientation	0.03** (0.05)	0.03 (0.04)	0.03** (0.04)	0.02 (0.04)	0.02* (0.04)	0.02 (0.04)
Culture (at age 14)	-	0.06** (0.06)	-	0.06** (0.06)	-	0.05** (0.05)
<b>Education</b>						
Degree	-0.01 (-0.02)	-0.01 (-0.03)	-0.02 (-0.04)	-0.02* (-0.05)	-0.02 (-0.04)	-0.02* (-0.05)
Some Tertiary	0.01 (0.01)	0.01 (0.01)	0.00 (0.01)	0.00 (0.01)	0.00 (0.01)	0.00 (0.00)
<b>Present Social Location</b>						
<b>Class</b>						
Social & Cultural			0.02 (0.03)	0.02 (0.03)	0.02 (0.03)	0.02 (0.03)
Human Services			0.01 (0.02)	0.01 (0.02)	0.02 (0.03)	0.01 (0.03)
Technical			-0.02 (-0.04)	-0.02* (-0.04)	-0.01 (-0.03)	-0.01 (-0.03)
Manager			-0.04** (-0.08)	-0.04** (-0.08)	-0.03** (-0.05)	-0.03** (-0.05)
Middle Class			-0.01 (-0.04)	-0.01 (-0.04)	-0.01 (-0.02)	-0.01 (-0.02)
Government Sector			0.01 (0.04)	0.01 (0.04)	0.00 (0.01)	0.00 (0.01)
<b>Residence</b>						
Urban Location			0.02 (0.04)	0.02 (0.03)	0.01 (0.02)	0.01 (0.02)
Suburban			-0.00 (-0.01)	-0.00 (-0.01)	-0.01 (-0.03)	-0.01 (-0.03)
No Religion			0.02** (0.06)	0.02** (0.06)	0.02* (0.04)	0.01* (0.04)
<b>Party ID</b>						
Other Parties					0.09*** (0.13)	0.09*** (0.12)
ALP					0.06*** (0.18)	0.06*** (0.18)
R <sup>2</sup> (adjusted for df)	0.04	0.05	0.06	0.06	0.09	0.10
n	(1779)	(1779)	(1779)	(1779)	(1779)	(1779)

Source: National Social Science Survey 1993

**Table XIII: OLS Regression Estimates for Predictors of Environmentalist Feeling Thermometer less Adolescent Cultural Consumption (NSSS).**

	Model 2a	Model 2	Model 3a	Model 3	Model 4a	Model 4
Intercept	0.51	0.50	0.47	0.46	0.40	0.39
<b>Social Background</b>						
Father's Education	0.003 (0.04)	0.002 (0.03)	0.001 (0.02)	0.001 (0.02)	0.002 (0.03)	0.00 (0.02)
<b>Father's Class</b>						
Social	0.05 (0.03)	0.05 (0.03)	0.04 (0.02)	0.03 (0.02)	0.04 (0.03)	0.04 (0.02)
Human Services	-0.06 (-0.03)	-0.06 (-0.03)	-0.07* (-0.04)	-0.07* (-0.04)	-0.05 (-0.03)	-0.05 (-0.03)
Technical	0.03 (0.04)	0.03 (0.03)	0.03 (0.03)	0.02 (0.03)	0.03 (0.04)	-0.03 (-0.04)
Manager	-0.02* (-0.04)	-0.02* (-0.04)	-0.02 (-0.03)	-0.02 (-0.03)	-0.00 (-0.00)	-0.00 (-0.00)
Middle Class	-0.01 (-0.02)	-0.01 (-0.02)	-0.02 (-0.03)	-0.02 (-0.03)	-0.01 (-0.02)	-0.01 (-0.02)
<b>Adolescent Socialisation</b>						
Age	-0.001** (-0.07)	-0.001** (-0.07)	-0.001** (-0.06)	-0.001** (-0.06)	-0.001* (-0.04)	-0.001* (-0.04)
Female	0.06*** (0.13)	0.05*** (0.12)	0.05*** (0.11)	0.05*** (0.10)	0.05*** (0.12)	0.05*** (0.11)
Value Orientation	0.04** (0.05)	0.04* (0.04)	0.04** (0.04)	0.04* (0.04)	0.03* (0.04)	0.03 (0.03)
Culture (at age 14)	-	0.11** (0.08)	-	0.10** (0.07)	-	0.09** (0.06)
<b>Education</b>						
Degree	0.03* (0.05)	0.02 (0.03)	-0.01 (-0.01)	-0.01 (-0.02)	-0.00 (-0.01)	-0.01 (-0.02)
Some Tertiary	0.05** (0.06)	0.05** (0.05)	0.03 (0.04)	0.03 (0.03)	0.03 (0.04)	0.03 (0.03)
<b>Present Social Location</b>						
<b>Class</b>						
Social			0.09** (0.07)	0.09** (0.07)	0.09** (0.07)	0.09** (0.07)
Human			0.07*** (0.10)	0.07** (0.09)	0.08*** (0.11)	0.08*** (0.11)
Technical			0.01 (0.01)	0.01 (0.01)	0.02 (0.03)	0.02 (0.03)
Manager			-0.04** (-0.05)	-0.04** (-0.05)	-0.01 (-0.02)	-0.01 (-0.02)
Middle Class			0.01 (0.01)	0.00 (0.00)	0.02 (0.04)	0.02 (0.03)
Government Sector			0.00 (0.00)	0.00 (0.00)	-0.01 (-0.03)	-0.02 (-0.03)
<b>Residence</b>						
Urban Location			0.05** (0.06)	0.04** (0.06)	0.03 (0.04)	0.03 (0.04)
Suburban			0.04** (0.08)	0.04** (0.08)	0.03** (0.05)	0.03** (0.05)
No Religion			0.05*** (0.09)	0.05*** (0.09)	0.04** (0.06)	0.03** (0.06)
<b>Party ID</b>						
Other Parties					0.14*** (0.13)	0.14*** (0.13)
ALP					0.11*** (0.24)	0.11*** (0.24)
R <sup>2</sup> (Adjusted for df) n	0.04 (1779)	0.04 (1779)	0.06 (1779)	0.06 (1779)	0.12 (1779)	0.12 (1779)

Source: National Social Science Survey 1993

# Appendix C

## Means, Standard Deviations and Range for NSSS Variables

Variable	Mean	Standard Deviation	Range
Issues Scale	0.68	0.15	0-1
Feeling Thermometer	0.54	0.23	-0-1
Members	1.9	0.29	1-2
Demonstrators	1.95	0.21	1-2
Fathers Education (years)	9.74	3.17	3-15
Parents Cultural Consumption	0.29	0.18	0-1
Fathers Class			
Social & cultural	0.02	0.15	1/0
Human services	0.02	0.14	1/0
Technical specialist	0.08	0.28	1/0
Managers	0.24	0.43	1/0
Middle Class	0.15	0.36	1/0
Age (years)	49.46	15.08	22-92
20-29	0.09	0.29	1/0
30-39	0.2	0.4	1/0
40-49	0.24	0.43	1/0
50-59	0.18	0.38	1/0
60-69	0.16	0.37	-1/0
Female	0.49	0.5	1/0
Adolescent Cultural Consumption	0.21	0.16	0-1
Postmaterialist scale	0.49	0.26	0-1
Degree	0.17	0.38	1/0
Some Tertiary	0.08	0.27	1/0
Class			
Social & Cultural	0.04	0.19	1/0
Human Services	0.1	0.3	1/0
Technical Specialists	0.1	0.29	1/0
Managers	0.11	0.31	1/0
Middle Class	0.26	0.44	1/0
Government Employment	0.25	0.43	1/0
Urban	0.11	0.32	1/0
Suburban	0.69	0.46	1/0
No religion	0.23	0.42	1/0
Other party	0.05	0.22	-1/0
ALP	0.44	0.5	1/0

Source: National Social Science Survey 1993

**Means, Standard Deviations and Range for 1990 AES Variables**

Variables	Mean	Standard Deviation	Range
Member	1.97	0.17	1-2
Potential member	1.78	0.41	1-2
Approve of groups	0.72	0.24	0-1
Fathers Class			
Social & cultural	0.03	0.16	1/0
Human services	0.02	0.14	1/0
Technical specialist	0.05	0.21	1/0
Managers	0.24	0.43	1/0
Middle Class	0.11	0.31	1/0
Age (years)	45.91	16.18	18-88
18-19	0.01	0.1	1/0
20-29	0.16	0.37	1/0
30-39	0.23	0.42	1/0
40-49	0.2	0.4	1/0
50-59	0.14	0.35	1/0
60-69	0.14	0.35	1/0
Female	0.51	0.5	1/0
Postmaterialist scale	0.44	0.3	0-1
Degree	0.1	0.3	1/0
Diploma	0.1	0.3	1/0
Class			
Social & cultural	0.03	0.17	1/0
Human services	0.08	0.27	1/0
Technical specialist	0.07	0.26	1/0
Managers	0.11	0.32	1/0
Middle Class	0.29	0.45	1/0
Government Employment	0.25	0.43	1/0
No religion	0.13	0.33	1/0
English Speaking Country	0.1	0.29	1/0
Political Ideology (left-right)	0.45	0.2	0-1
Other party	0.07	0.26	1/0
ALP	0.45	0.5	1/0

Source: Australian Electoral Study 1990

## Means, Standard Deviations and Range for 1993 AES Variables

Variables	Mean	Standard Deviation	Range
Member	1.95	0.18	1-2
Potential Member	1.8	0.35	1-2
Approve of groups	0.73	0.21	0-1
Fathers Class			
Social & cultural	0.02	0.11	1/0
Human services	0.04	0.18	1/0
Technical specialist	0.06	0.21	1/0
Managers	0.22	0.37	1/0
Middle Class	0.1	0.26	1/0
Age (years)	48.85	14.41	18-93
18-19	0.01	0.09	1/0
20-29	0.12	0.29	1/0
30-39	0.19	0.35	1/0
40-49	0.21	0.36	1/0
50-59	0.16	0.32	1/0
60-69	0.16	0.32	1/0
Female	0.49	0.44	1/0
Postmaterialist scale	0.46	0.26	0-1
Degree	0.14	0.31	1/0
Diploma	0.08	0.24	1/0
Class			
Social & cultural	0.02	0.13	1/0
Human services	0.09	0.26	1/0
Technical specialist	0.07	0.23	1/0
Managers	0.11	0.28	1/0
Middle Class	0.26	0.39	1/0
Government Employment	0.26	0.39	1/0
No religion	0.14	0.31	1/0
English Speaking Country	0.1	0.27	1/0
Urban	0.33	0.42	1/0
Suburban	0.26	0.39	1/0
Political Ideology (left-right)	0.47	0.18	0-1
Other party	0.03	0.14	1/0
ALP	0.44	0.44	1/0

Source: Australian Electoral Study 1993

## Appendix D

## Correlations AES 1993

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	
1 Members																																					
2 Potential Members	-.10																																				
3 Envir Grp Appr.	.16	.30																																			
4 Fathers Social & Cult	.01	.05	.03																																		
5 Fathers Human Serv.	.01	.00	.03	-.03																																	
6 Fathers Technical	.07	.06	.05	-.03	-.05																																
7 Fathers Managers	.01	-.02	-.06	-.07	-.11	-.13																															
8 Fathers Middle Class	.03	.01	.01	-.04	-.07	-.08	-.17																														
9 Fathers Manual Work	-.05	-.01	.00	-.11	-.18	-.21	-.46	-.28																													
10 Age (yrs)	-.04	-.19	-.14	-.03	-.04	-.05	.07	-.04	-.02																												
11 Women	.01	.02	.05	.00	.00	.02	.01	.03	-.03	.02																											
12 Men	.00	-.01	-.05	.00	.00	-.01	.01	-.02	.05	-.02	-.96																										
13 Values Index	.10	.13	.14	.03	.00	.09	-.04	.00	-.03	-.05	-.02	.01																									
14 Degree	.14	.13	.09	.08	.07	.15	.00	.06	-.12	-.17	-.03	.04	.07																								
15 Diploma	.03	.07	.02	.04	.01	.06	.00	.06	-.08	-.03	.02	-.02	.02	-.12																							
16 Other Education	-.04	.02	.03	-.02	-.04	-.04	-.07	-.02	.15	.02	-.18	.18	-.02	-.28	-.21																						
17 No Post Sec Ed	-.07	-.14	-.08	-.06	-.01	-.09	.07	-.03	.01	.08	.20	-.18	-.03	-.34	-.24	-.58																					
18 Social & Cultural Prof	.11	.04	.06	-.07	.01	.08	.01	.02	-.06	-.08	-.03	.03	.06	.14	.06	-.04	-.08																				
19 Human Services Prof	.06	.08	.09	.03	.04	.08	.00	.08	-.08	-.06	.10	-.10	.03	.29	.22	-.08	-.24	-.05																			
20 Technical Prof.	.09	.04	.02	.03	.07	.09	-.02	.01	-.03	-.05	-.13	.13	.01	.35	.10	-.11	-.19	-.04	-.09																		
21 Manager	.04	-.04	-.07	.01	.01	.11	.00	-.07	.06	-.15	.16	.00	.05	.04	-.02	-.03	-.05	-.11	-.10																		
22 Middle Class	-.06	.03	.01	-.04	-.02	.04	-.03	.04	.03	-.10	.29	-.28	.01	-.15	-.04	-.03	.19	-.09	-.19	-.16	-.21																
23 Manual Workers	-.06	-.02	-.02	-.02	-.02	-.10	-.05	-.06	.15	-.01	-.29	.30	-.02	-.23	-.14	.30	-.01	-.09	-.20	-.17	-.22	-.37															
24 Government Sector	.01	.05	.04	.01	.01	.04	-.03	.05	-.02	-.04	-.04	.05	.02	.18	.12	-.02	-.14	.04	.29	.08	-.07	-.01	-.01														
25 Other Empl. Sect	.00	.01	-.03	-.01	.02	.03	.02	-.01	.05	-.13	-.10	.12	.01	-.08	-.06	.13	.03	.00	-.20	.01	.18	.16	.17	-.69													
26 Urban Residence	-.02	.05	.07	.03	.03	.05	-.04	.03	-.03	.08	.02	-.02	.01	.12	.01	-.04	-.05	.07	.00	.08	-.02	.02	-.06	.00	-.01												
27 Suburban Residence	.03	.00	.02	.01	.05	.02	-.07	.01	.02	-.09	-.01	.01	.00	-.02	.06	.00	-.02	.00	-.03	.02	-.01	.07	-.02	.00	.04	-.41											
28 Rural Residence	-.01	-.05	-.09	-.03	-.07	-.06	.10	-.04	.01	.02	-.01	.01	-.01	-.11	-.06	.04	.07	-.06	.02	-.10	.04	-.08	.08	.00	.03	-.58	-.49										
29 No Rel Denom	.10	.08	.08	.04	.00	.07	.00	-.02	-.05	-.14	-.06	.07	.12	.13	.02	-.04	-.06	.10	.05	.06	.00	-.04	-.02	.01	.02	.02	-.02	.00									
30 Rel Denom	-.08	-.06	-.05	-.04	.01	-.05	.03	.03	.09	.12	.10	-.03	-.12	-.11	.00	.05	.08	-.09	-.04	-.04	.02	.06	.04	.00	.02	-.02	.02	.01	-.90								
31 Australian Born	-.01	-.01	-.04	-.01	.02	.01	.09	.02	.01	-.07	.07	-.02	-.01	-.05	.01	.00	.07	-.02	.03	-.04	.04	.06	-.05	.01	.00	-.10	-.06	.15	-.02	.09							
32 English Spk Cntr	.04	.01	.03	.03	.01	.02	-.08	-.01	.03	.09	.01	.00	.01	.00	.02	.00	-.01	.04	.00	.01	-.03	.01	.00	.01	.01	.00	.04	-.04	.02	-.01	-.61						
33 Non-Eng. Spk Cntr	-.02	.00	.02	-.01	-.04	-.03	-.04	-.02	-.04	.01	-.10	.02	.00	.06	-.02	.00	-.07	-.01	-.03	.04	-.02	-.09	.06	-.02	.00	.13	.03	-.15	.00	-.10	-.70	-.13					
34 Political Orientation	.07	.14	.14	.03	.01	.00	-.07	-.03	.05	-.18	.01	-.01	.10	.08	-.03	-.01	-.02	.04	.03	.04	-.09	-.01	.06	.03	.01	.02	-.01	-.01	.13	-.12	-.04	.05	.01				
35 Other Party Id.	.09	.04	.07	.04	.02	.03	-.01	-.01	.00	-.05	.00	.01	.06	.04	.02	.01	-.04	.04	.05	.03	.01	-.02	-.03	.04	-.01	.01	.01	-.02	.06	-.05	.00	.01	-.01	.05			
36 ALP Id	-.01	.11	.19	-.03	.00	-.03	-.14	-.04	.12	-.07	-.04	.05	.06	-.02	-.07	.04	.03	-.01	-.02	-.04	-.15	-.01	.17	.07	-.07	.02	-.04	.01	.04	-.02	-.04	.02	.03	.28	-.14		
37 Coalition Id	-.04	-.11	-.21	.01	-.01	.04	.16	.03	-.13	.13	-.07	-.07	-.11	-.04	.05	-.02	.00	-.01	-.01	.00	.15	.04	-.15	-.10	.08	-.02	.02	.00	-.10	.09	.06	-.03	-.05	-.33	-.13	-.73	

# Correlations NSSS 1993

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	
1 Members																																			
2 Demonstrators	.21																																		
3 Environmental Issues	.16	.10																																	
4 Environmental Feelings	.20	.10	.36																																
5 Fathers Education (yrs)	.09	.04	.03	.07																															
6 Fathers Social & Cult	.01	.04	-.01	.06	.21																														
7 Fathers Human Services	.00	-.01	.00	-.02	.15	-.02																													
8 Fathers Technical	.05	.01	-.01	.07	.20	-.05	-.04																												
9 Fathers Managers	.02	.06	-.05	-.05	-.07	-.09	-.08	-.17																											
10 Fathers Middle Class	.00	-.03	-.03	-.01	.03	-.07	-.06	-.13	-.24																										
11 Fathers Manual Workers	-.05	-.05	.07	.01	-.18	-.12	-.12	-.24	-.45	-.34																									
12 Age (yrs)	-.03	-.02	-.13	-.10	-.14	.00	.00	-.06	.07	-.03	-.05																								
13 Women	.00	.05	.16	.13	.01	.03	.05	.02	.02	-.05	-.02	.05	.02	.05	-.05	-.05																			
14 Men	.00	-.05	-.16	-.13	-.01	-.03	-.05	-.02	-.02	.05	.02	.05	-.99																						
15 Values Index	.12	.10	.06	.07	.07	.01	.01	.03	-.01	.02	-.05	-.06	.03	-.03																					
16 Cultural Consumption	.10	.08	.08	.12	.18	.10	.04	.07	-.01	.01	-.10	-.05	.12	-.12	.10																				
17 Degree	.11	.07	-.01	.06	.19	.14	.05	.07	.02	.03	-.10	-.14	.00	-.01	.04	.23																			
18 Some Tertiary Education	.05	.05	.01	.05	.06	-.02	.01	.00	.03	.04	-.05	.01	-.03	.03	.06	.05	-.13																		
19 No Tertiary Education	-.12	-.09	.02	-.08	-.19	-.11	-.05	-.06	-.03	-.04	.11	.09	.01	-.01	-.08	-.23	-.76	-.49																	
20 Social & Cultural Prof	.04	.03	.03	.08	.12	.13	-.01	.01	.02	.01	-.06	-.03	-.05	.05	.05	.05	.21	.03	-.19																
21 Human Services Prof.	.07	.06	.07	.13	.07	.08	.09	.02	.02	.01	-.07	-.05	.20	-.20	.02	.14	.33	.11	-.34	-.06															
22 Technical Prof	.06	.00	-.04	.00	.06	.02	.00	.04	-.02	.03	-.02	-.08	-.18	.18	.02	.04	.16	.07	-.17	-.06	-.11														
23 Manager	.00	.01	-.11	-.09	-.01	-.05	-.01	.04	.04	.02	-.04	.05	-.17	.17	.01	-.04	.04	.06	-.06	-.07	-.11	-.11													
24 Middle Class	-.03	-.03	.02	.02	.03	.01	.02	.00	-.06	.02	.05	-.10	.20	-.20	.02	.05	-.13	-.05	.14	-.12	-.20	-.19	-.20												
25 Manual Workers	-.06	-.02	.01	-.04	-.09	-.04	-.06	-.06	.00	-.06	.10	-.02	-.20	.20	-.04	-.10	-.19	-.09	.21	-.10	-.17	-.17	-.18	-.31											
26 Government Employ	.06	.06	.05	.05	.05	-.02	.01	.03	-.01	.00	.02	-.19	-.10	.11	.02	.05	.19	.04	-.18	.07	.22	.15	-.03	.00	-.06										
27 Other Employment	-.06	.06	-.05	-.05	-.05	.02	-.01	-.03	.01	.00	-.02	.19	.10	-.11	-.02	-.05	-.19	-.04	.18	-.07	-.22	-.15	.03	.00	.06	-.100									
28 Urban Residence	.02	-.02	.05	.03	.07	.03	.01	.04	.01	.00	.00	-.05	.01	-.01	.00	.07	.11	-.01	-.08	.01	.02	.10	.00	-.02	-.04	.04	-.04								
29 Suburban Residence	-.05	.00	-.03	.05	-.01	.01	.00	.02	-.14	.07	.03	.03	-.01	.01	-.02	-.03	-.01	.01	.00	.01	.00	-.04	-.05	.08	.01	.03	-.03	-.54							
30 Rural Residence	.04	.02	.00	-.08	-.04	-.03	-.01	-.05	.16	-.08	-.04	.01	.01	-.01	.02	-.03	-.08	.00	.07	-.03	-.02	-.03	.06	-.07	.02	-.06	.06	-.17	-.71						
31 No Religious Denom	.09	.09	.07	.11	.11	.01	.04	.06	-.05	.02	-.02	-.12	-.05	.05	.08	.06	.11	.05	-.11	.08	.03	.09	.02	-.03	-.03	.09	-.09	.02	-.02	.03	-.100				
32 Religious Denomination	-.09	-.09	-.07	-.11	-.11	-.01	-.04	-.06	.05	-.02	.02	.12	.05	-.05	-.08	-.06	-.11	-.05	.11	-.08	-.03	-.09	-.02	.03	.03	-.09	.09	-.02	-.02	.03	-.100				
33 Other Party Id	.08	.04	.11	.11	.09	.01	.00	.07	.03	-.01	-.06	-.09	.00	.00	.06	.09	.07	.04	-.08	.09	.07	.02	-.06	-.03	.01	.09	-.09	.00	.00	.01	.06	-.06			
34 ALP Id	.03	.03	.17	.22	-.05	-.01	.03	-.03	-.16	.02	.14	-.05	-.05	.05	-.01	-.02	-.04	-.03	.05	-.01	-.02	-.01	-.08	-.03	.13	.09	-.09	.04	.06	-.11	.09	-.09	-.20		
35 Coalition Id	-.07	-.07	-.23	-.24	.01	-.01	.02	.01	.17	-.03	-.12	.11	.05	-.05	-.05	-.04	-.02	.00	.01	-.04	-.02	-.02	.13	.05	-.12	-.13	.13	-.03	.07	.12	-.11	.11	-.19	-.74	

# Correlations AES 1990

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33
1 Members																																	
2 Potential Members	-.09																																
3 Environmental Group Approval	.12	.34																															
4 Fathers Social & Cultural	.13	.05	.02																														
5 Fathers Human Services	.02	.02	.00	-.02																													
6 Fathers Technical	.02	.05	.01	-.04	-.03																												
7 Fathers Managers	.00	.00	-.06	-.09	-.08	-.12																											
8 Fathers Middle Class	.00	.02	.04	.06	-.05	-.08	-.20																										
9 Fathers Manual Workers	-.05	-.07	.02	-.16	-.14	-.21	-.55	-.34																									
10 Age (yrs)	-.03	-.19	-.18	-.06	-.02	-.02	.06	-.08	.00																								
11 Women	.03	.05	.05	.00	-.02	.00	.00	-.02	.02	-.06																							
12 Men	-.03	-.04	-.05	.00	.02	.00	.01	.03	-.03	.05	-.98																						
13 Values Index	.10	.14	.10	.05	.00	.00	-.01	-.02	.00	-.05	.00	-.01																					
14 Degree	.11	.13	.08	.09	.12	.04	.05	.05	-.15	-.13	-.04	.05	.11																				
15 Diploma	.03	.09	.03	.02	.01	.07	.01	.03	-.05	-.06	.07	-.06	.00	-.11																			
16 Other Education	.00	.00	-.01	.02	.01	.04	-.07	-.02	.04	.00	-.21	.22	.00	-.21	-.21																		
17 No Post Secondary Education	-.08	-.11	-.06	-.07	-.08	-.08	.01	-.02	.06	.07	.18	-.18	-.08	-.31	-.31	-.59																	
18 Social & Cultural Professional	.13	.04	.06	.04	.01	.00	.03	.02	-.04	-.01	-.03	.03	.08	.20	.08	-.04	-.11																
19 Human Services Professional	.05	.10	.04	.04	.07	.05	.05	.03	-.11	-.05	.15	-.15	.00	.28	.16	.03	-.27	-.05															
20 Technical Professional	.03	.03	.03	.07	.01	.08	-.05	.02	-.03	-.04	-.15	.16	.03	.19	.04	.04	-.15	-.05	-.08														
21 Manager	.01	-.04	-.07	.01	-.01	.01	.11	.01	-.10	.05	-.16	.17	-.03	.00	.05	-.02	.00	-.06	-.10	-.10													
22 Middle Class	-.04	.04	.05	-.02	.00	.01	-.10	.07	.03	-.10	.25	-.24	-.02	-.09	.03	-.05	.11	-.11	-.18	-.18	-.22												
23 Manual Workers	-.04	-.06	-.04	-.04	-.03	-.06	-.03	-.09	.13	-.02	-.24	.24	.00	-.19	.15	.15	.06	-.11	-.18	-.18	-.23	-.41											
24 Government Sector	.03	.08	.03	.01	.02	.05	-.03	.06	-.03	-.01	-.05	.06	.01	.17	.11	.01	-.15	.09	.23	.11	-.09	.06	-.09										
25 Other Employment Sector	-.02	-.04	-.01	.01	.01	-.02	-.02	-.01	.02	-.12	-.07	.08	.00	-.08	-.06	.10	.01	-.06	-.14	-.04	.16	.10	.19	-.75									
26 No Religious Denomination	.07	.14	.10	.04	.02	.02	-.03	.04	-.02	-.12	-.08	.09	.10	.17	.07	-.05	-.09	.04	.02	.07	.04	-.05	-.01	.06	-.02								
27 Religious Denomination	-.06	-.14	-.10	-.05	-.02	.00	.03	-.02	.00	.12	.09	-.05	-.11	-.15	-.06	.05	.10	-.04	-.02	-.04	-.03	.06	.02	-.03	.03	-.89							
28 Australian Born	.02	.03	-.03	.02	.01	-.05	.00	.06	-.01	-.14	.09	-.05	.02	.04	.01	-.04	.03	.03	.05	-.01	.00	.04	-.05	.01	.01	.04	.00						
29 English Speaking Country of Birth	.00	-.03	.01	-.01	-.02	.03	-.07	-.03	.06	.11	-.02	.02	.00	-.03	.00	.04	-.04	-.03	.00	.03	.02	-.02	.00	.04	-.02	.02	.00	-.60					
30 Non-English Speaking Country of Birth	-.02	.00	.02	-.02	.00	.04	.05	-.04	-.04	.08	-.09	.05	-.02	-.03	-.01	.01	-.01	-.02	-.06	-.01	-.01	-.03	.06	-.04	.00	-.07	.00	-.72	-.13				
31 Political Orientation	.08	.12	.16	.04	-.01	.01	-.06	.02	.03	-.17	.05	-.05	.09	.08	-.02	-.05	.03	.05	.03	.00	-.08	-.02	.03	.09	-.08	.12	-.11	.00	.04	-.04			
32 Other Party Identification	.09	.10	.12	.05	.03	.03	.00	.02	-.05	-.08	.04	-.04	.08	.07	.00	.02	-.04	.04	.06	-.03	-.04	.02	-.02	.02	-.01	.07	-.06	.03	.00	-.04	.09		
33 ALP Identification	.00	.06	.16	-.05	-.08	-.03	-.15	-.02	.18	-.08	-.01	.01	.00	-.05	-.05	-.02	.09	.00	-.05	-.03	-.12	.00	.13	.06	-.07	.05	-.04	-.05	.03	.04	.22	-.25	
34 Coalition Identification	-.07	-.13	-.22	.03	.05	-.01	.19	.01	-.17	.13	.02	-.02	-.06	-.01	.06	.02	-.06	-.01	.02	.02	.14	.00	-.11	-.08	.08	-.13	.11	.03	-.02	-.03	-.31	-.23	-.74